State of Utah

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Governor

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Lieutenant Governor

Department of
Environmental Quality

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Acting Executive Director

DIVISION OF AIR QUALITY
Cheryl Heying
Director

Title V Operating Permit

PERMIT NUMBER: 1100007002
DATE OF PERMIT: October 1, 2008
Date of Last Revision: February 25, 2009

This Operating Permit is issued to, and applies to the following:

Name of Permittee:

Hill Air Force Base
75 CEG/CEV
7274 Wardleigh Road
Hill Air Force Base UT 840565137

Permitted Location:

Hill Air Force Base: Main Base
75 CEG/CEV
7274 Wardleigh Road
Hill Air Force Base UT 84056-5137

UTM coordinates: 416,588 m Easting, 4,553,000 m Northing
SIC code: 9711 (National Security)

UTAH AIR QUALITY BOARD

By:

M. Cheryl Heying, Executive Secretary

Prepared By:

James Chapman

ENFORCEABLE DATES AND TIMELINES

The following dates or timeframes are referenced in Section I: General Provisions of this permit.

Annual Certification Due:	October 1 and on that date of every calendar year that this permit is in force.
Renewal application due:	October 1, 2012
Permit expiration date:	October 1, 2013
Definition of "prompt":	written notification within 21 days.

ABSTRACT

Hill Air Force Base (HAFB), Main Base is located in Davis and Weber Counties about 30 miles north of Salt Lake City and comprises 6,600 acres including the Little Mountain facility located 18 miles northwest of the main base. The base provides worldwide logistics support for some of the Air Force and Defense Department's most sophisticated weapon systems. Support operations include systems management, spare parts, and major maintenance and modification services. HAFB has extensive industrial facilities for painting, paint stripping, plating, parts warehousing/distribution, and wastewater treatment. In addition, HAFB manages and maintains other systems such as conventional air munitions, solid propellants, landing gear and training devices.

HAFB is a major source of air pollution for PM_{10}, NO_x, CO, VOC and HAP emissions. HAFB is subject to 40 CFR 60 Subparts A ,Dc, IIII, and JJJJ; 40 CFR 63 Subparts A, N, T, GG,and ZZZZ ; and 40 CFR 82 Subparts B, F, and H.

OPERATING PERMIT HISTORY

Permit/Activity	Date Issued	Recorded Changes
Title V administrative amendment - enhanced AO (Project #OPP0101210016)	2/25/2009	Changes: To incorporate requirements from two recently issued approval orders: DAQE-AN0101210190-08 which added a high velocity oxygenated flame spray booth and DAQE-AN0101210191-08 which increased the JP-8 fuel throughput.
Title V renewal application (Project #OPP0101210015)	10/1/2008	Changes: To modify applicability, monitoring, and applicable requirements of emission units in the Title V permit. Rescind approval order DAQE-AN0121164-04 for laser machining system in building 257.Incorporate changes from approval order DAQE-AN0121174-06 for hydrazine monitoring provisions. Revise monitoring and recordkeeping provisions for boilers DAQE-AN0101210181-07 and limited use power supply units DAQE-AN0121175-06. Incorporate changes from approval order Miscellaneous Operations in Building 238 DAQE-AN0101210184-07 to update composite core milling processes. Incorporate changes from approval order DAQE-AN0101210186-08 for IC Engine/Turbine Test Stands.Incorporate changes from approval order DAQE-AN0101210187-08 for Jet Fuel Storage Tanks.Incorporate changes from approval order DAQE-AN0101210189-08 for Metal Melt Furnaces.Incorporate revised provisions of 40 CFR 60 Subpart Dc. Incorporate new provisions for 40 CFR 60 Subpart IIII and Subpart JJJJ and 40 CFR 63 Subpart ZZZZ.
Title V administrative amendment - enhanced AO (Project #OPP0101210014)	9/26/2007	Additions: To incorporate modification to AO DAQE-AN0101210182-07 to update jet engine testing process equipment and recordkeeping conditions and AO DAQE-AN0101210183-07 to increase the IC engine/turbine test stands fuel consumption limit.
Title V administrative amendment by DAQ (Project #OPP0101210013)	6/21/2007	Changes: To incorporate modifications to Thermal Metal Spray and Landfill Gas Power Generation Facility Approval Orders (DAQE-AN101210177-07 & DAQE-AN101210179-07, respectively) and to update EPA address changes to the general provisions section.
Title V administrative amendment by DAQ (Project #OPP0101210011)	12/20/2005	Changes: To incorporate modification to solvent operation AO (DAQE-AN0121173-05), to correct typographical errors in Chrome Plating line, to remove conditions of recinded AO, and to incorporate changes from recent updates to the Utah Air Quality Rules

Title V significant modification (Project #OPP0101210009)	7/25/2005	Changes: to modify applicability, monitoring, and applicable requirements of emission units in the Title V permit. Also to incorporate changes from two recently issued approval orders: DAQE-AN0121171-05 Modification of Chrome Plating permit to replace tanks and scrubbers, and DAQE-AN0121172-05 Modification of Aircraft Purge System Permit to increase throughput of JP-5 and/or JP-8.
Title V administrative amendment by DAQ (Project #OPP0101210010)	3/1/2005	Changes: To incorporate changes from new AO (DAQE-AN0121170-05), add load testing of generators on Pad 1723A.
Title V administrative amendment by DAQ (Project #OPP0101210008)	11/4/2004	Changes: to modify existing conditions from two recently issued approval orders: DAQE-AN0121167-04 Modification of Abrasive Blast Permit to Change Record Keeping Requirements; and DAQE-AN0121168-04 Modification of Painting and Chemically Depainting Permit to Change Record Keeping Requirements.
Title V administrative amendment by DAQ (Project #OPP0101210007)	8/18/2004	Changes: to add new and modify existing conditions from six recently issued approval orders: DAQE-AN0121164-04: New Laser Machining System, DAQE-AN0121163-04: Remove Redundant Conditions from Building 843 AO, DAQE-AN0121166-04: Modify Landfill Gas Power Generation Facility AO, DAQE-AN0121162-04: Remove Redundant Conditions from Building 1701 AO, DAQE-AN0121165-04: Remove Redundant Conditions from Landing Gear Overhaul Facility AO, DAQE-10121152-04: Remove Redundant Conditions from Boiler AO.
Title V administrative amendment by DAQ (Project #OPP0101210006)	4/6/2004	Changes: to add new and modify existing conditions from four recently issued approval orders: DAQE-AN0121159-04: Plasma Cutting Booth, DAQE-AN0121154-03: 275,000 Gallon JP8 Tank, DAQE-AN0121157-03: Landfill Gas Power Generation Facility, DAQE-AN0121160-04: Change to Carbon Brake AO, DAQE-AN0121161: Change to Hydrazine AO, DAQE-10121133-04: Change to Jet Engine Test Stand AO
Title V administrative amendment by DAQ (Project #OPP0101210005)	1/21/2004	Changes: to incorporate conditions from new AO (DAQE-AN0121132-03) on limited use generators and remove conditions regarding NSPS Subpart Kb requirements since it no longer applies to Hill Air Force Base.
Title V administrative amendment by DAQ (Project #OPP0101210004)	10/7/2003	Changes: to incorporate conditions from new AO (DAQE-0121000-03) for solvent cleaning operations at Hill Air Force Base.
Title V administrative amendment by DAQ (Project #OPP0101210003)	7/15/2003	Changes: The issuance of four new approval orders (DAQE-AN0121155-03, DAQE-AN0121156-03, DAQE-AN0121148-03, and DAQE-AN0121150-03) for Hill Air

		Force Base has made necessary the addition and modification of conditions in the Title V permit.
Title V administrative amendment by DAQ (Project #OPP0101210002)	3/12/2003	Changes: The issuance of two new approval orders for Hill Air Force Base has made necessary the addition and modification of conditions in the Title V permit.
Title V initial application (Project #OPP0101210001)	10/25/2002	Initial Title V permit issued.

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Issued under authority of Utah Code Ann. Section 19-2-104 and 19-2-109.1, and in accordance with Utah Administrative Code R307-415 Operating Permit Requirements.

All definitions, terms and abbreviations used in this permit conform to those used in Utah Administrative Code R307-101 and R307-415 (Rules), and 40 Code of Federal Regulations (CFR), except as otherwise defined in this permit. Unless noted otherwise, references cited in the permit conditions refer to the Rules.

Where a permit condition in Section I, General Provisions, partially recites or summarizes an applicable rule, the full text of the applicable portion of the rule shall govern interpretations of the requirements of the rule. In the case of a conflict between the Rules and the permit terms and conditions of Section II, Special Provisions, the permit terms and conditions of Section II shall govern except as noted in Provision I.M, Permit Shield.

SECTION I: GENERAL PROVISIONS

I.A **Federal Enforcement.**

All terms and conditions in this permit, including those provisions designed to limit the potential to emit, are enforceable by the EPA and citizens under the Clean Air Act of 1990 (CAA) except those terms and conditions that are specifically designated as "State Requirements". (R307-415-6b)

I.B **Permitted Activity(ies).**

Except as provided in R307-415-7b(1), the permittee may not operate except in compliance with this permit. (See also Provision I.E, Application Shield)

I.C **Duty to Comply.**

I.C.1 The permittee must comply with all conditions of the operating permit. Any permit noncompliance constitutes a violation of the Air Conservation Act and is grounds for any of the following: enforcement action; permit termination; revocation and reissuance; modification; or denial of a permit renewal application. (R307-415-6a(6)(a))

I.C.2 It shall not be a defense for a permittee in an enforcement action that it would have been necessary to halt or reduce the permitted activity in order to maintain compliance with the conditions of this permit. (R307-415-6a(6)(b))

I.C.3 The permittee shall furnish to the Executive Secretary, within a reasonable time, any information that the Executive Secretary may request in writing to determine whether cause exists for modifying, revoking and reissuing, or terminating this permit or to determine compliance with this permit. Upon request, the permittee shall also furnish to the Executive Secretary copies of records required to be kept by this permit or, for information claimed to be confidential, the permittee may furnish such records directly to the EPA along with a claim of confidentiality. (R307-415-6a(6)(e))

I.C.4 This permit may be modified, revoked, reopened, and reissued, or terminated for cause. The filing of a request by the permittee for a permit modification, revocation and reissuance, or termination, or of a notification of planned changes or anticipated noncompliance shall not stay any permit condition, except as provided under R307-415-7f(1) for minor permit modifications. (R307-415-6a(6)(c))

I.D **Permit Expiration and Renewal.**

I.D.1 This permit is issued for a fixed term of five years and expires on the date shown under "Enforceable Dates and Timelines" at the front of this permit. (R307-415-6a(2))

I.D.2 Application for renewal of this permit is due on or before the date shown under "Enforceable Dates and Timelines" at the front of this permit. An application may be submitted early for any reason. (R307-415-5a(1)(c))

I.D.3 An application for renewal submitted after the due date listed in I.D.2 above shall be accepted for processing, but shall not be considered a timely application and shall not relieve the permittee of any enforcement actions resulting from submitting a late application. (R307-415-5a(5))

I.D.4 Permit expiration terminates the permittee's right to operate unless a timely and complete renewal application is submitted consistent with R307-415-7b (see also Provision I.E, Application Shield) and R307-415-5a(1)(c) (see also Provision I.D.2). (R307-415-7c(2))

I.E **Application Shield.**

If the permittee submits a timely and complete application for renewal, the permittee's failure to have an operating permit will not be a violation of R307-415, until the Executive Secretary takes final action on the permit renewal application. In such case, the terms and conditions of this permit shall remain in force until permit renewal or denial. This protection shall cease to apply if, subsequent to the completeness determination required pursuant to R307-415-7a(3), and as required by R307-415-5a(2), the applicant fails to submit by the deadline specified in writing by the Executive Secretary any additional information identified as being needed to process the application. (R307-415-7b(2))

I.F **Severability.**

In the event of a challenge to any portion of this permit, or if any portion of this permit is held invalid, the remaining permit conditions remain valid and in force. (R307-415-6a(5))

I.G **Permit Fee.**

I.G.1 The permittee shall pay an annual emission fee to the Executive Secretary consistent with R307-415-9. (R307-415-6a(7))

I.G.2 The emission fee shall be due on October 1 of each calendar year or 45 days after the source receives notice of the amount of the fee, whichever is later. (R307-415-9(4)(a))

I.H **No Property Rights.**

This permit does not convey any property rights of any sort, or any exclusive privilege. (R307-415-6a(6)(d))

I.I **Revision Exception.**

No permit revision shall be required, under any approved economic incentives, marketable permits, emissions trading and other similar programs or processes for changes that are provided for in this permit. (R307-415-6a(8))

I.J **Inspection and Entry.**

I.J.1 Upon presentation of credentials and other documents as may be required by law, the

permittee shall allow the Executive Secretary or an authorized representative to perform any of the following:

I.J.1.a Enter upon the permittee's premises where the source is located or emissions related activity is conducted, or where records are kept under the conditions of this permit. (R307-415-6c(2)(a))

I.J.1.b Have access to and copy, at reasonable times, any records that must be kept under the conditions of this permit. (R307-415-6c(2)(b))

I.J.1.c Inspect at reasonable times any facilities, equipment (including monitoring and air pollution control equipment), practice, or operation regulated or required under this permit. (R307-415-6c(2)(c))

I.J.1.d Sample or monitor at reasonable times substances or parameters for the purpose of assuring compliance with this permit or applicable requirements. (R307-415-6c(2)(d))

I.J.2 Any claims of confidentiality made on the information obtained during an inspection shall be made pursuant to Utah Code Ann. Section 19-1-306. (R307-415-6c(2)(e))

I.K **Certification.**

Any application form, report, or compliance certification submitted pursuant to this permit shall contain certification as to its truth, accuracy, and completeness, by a responsible official as defined in R307-415-3. This certification shall state that, based on information and belief formed after reasonable inquiry, the statements and information in the document are true, accurate, and complete. (R307-415-5d)

I.L **Compliance Certification.**

I.L.1 Permittee shall submit to the Executive Secretary an annual compliance certification, certifying compliance with the terms and conditions contained in this permit, including emission limitations, standards, or work practices. This certification shall be submitted no later than the date shown under "Enforceable Dates and Timelines" at the front of this permit, and that date each year following until this permit expires. The certification shall include all the following (permittee may cross-reference this permit or previous reports): (R307-415-6c(5))

I.L.1.a The identification of each term or condition of this permit that is the basis of the certification;

I.L.1.b The identification of the methods or other means used by the permittee for determining the compliance status with each term and condition during the certification period. Such methods and other means shall include, at a minimum, the monitoring and related recordkeeping and reporting requirements in this permit. If necessary, the permittee also shall identify any other material information that must be included in the certification to comply with section 113(c)(2) of the Act, which prohibits knowingly making a false certification or omitting material information;

I.L.1.c The status of compliance with the terms and conditions of the permit for the period covered by the certification, including whether compliance during the period was continuous or intermittent. The certification shall be based on the method or means designated in Provision I.L.1.b. The certification shall identify each deviation and take it into account in the compliance certification. The certification shall also identify as possible exceptions to

compliance any periods during which compliance is required and in which an excursion or exceedance as defined under 40 CFR Part 64 occurred; and

I.L.1.d Such other facts as the Executive Secretary may require to determine the compliance status.

I.L.2 The permittee shall also submit all compliance certifications to the EPA, Region VIII, at the following address or to such other address as may be required by the Executive Secretary: (R307-415-6c(5)(d))

Environmental Protection Agency, Region VIII
Office of Enforcement, Compliance and Environmental Justice
(mail code 8ENF)
1595 Wynkoop Street
Denver, CO 80202-1129

I.M **Permit Shield.**

I.M.1 Compliance with the provisions of this permit shall be deemed compliance with any applicable requirements as of the date of this permit, provided that:

I.M.1.a Such applicable requirements are included and are specifically identified in this permit, or (R307-415-6f(1)(a))

I.M.1.b Those requirements not applicable to the source are specifically identified and listed in this permit. (R307-415-6f(1)(b))

I.M.2 Nothing in this permit shall alter or affect any of the following:

I.M.2.a The emergency provisions of Utah Code Ann. Section 19-1-202 and Section 19-2-112, and the provisions of the CAA Section 303. (R307-415-6f(3)(a))

I.M.2.b The liability of the owner or operator of the source for any violation of applicable requirements under Utah Code Ann. Section 19-2-107(2)(g) and Section 19-2-110 prior to or at the time of issuance of this permit. (R307-415-6f(3)(b)

I.M.2.c The applicable requirements of the Acid Rain Program, consistent with the CAA Section 408(a). (R307-415-6f(3)(c))

I.M.2.d The ability of the Executive Secretary to obtain information from the source under Utah Code Ann. Section 19-2-120, and the ability of the EPA to obtain information from the source under the CAA Section 114. (R307-415-6f(3)(d))

I.N **Emergency Provision.**

I.N.1 An "emergency" is any situation arising from sudden and reasonably unforeseeable events beyond the control of the source, including acts of God, which situation requires immediate corrective action to restore normal operation, and that causes the source to exceed a technology-based emission limitation under this permit, due to unavoidable increases in emissions attributable to the emergency. An emergency shall not include noncompliance to the extent caused by improperly designed equipment, lack of preventive maintenance, careless or improper operation, or operator error. (R307-415-6g(1))

I.N.2 An emergency constitutes an affirmative defense to an action brought for noncompliance with such technology-based emission limitations if the affirmative defense is demonstrated

through properly signed, contemporaneous operating logs, or other relevant evidence that:

I.N.2.a An emergency occurred and the permittee can identify the causes of the emergency. (R307-415-6g(3)(a))

I.N.2.b The permitted facility was at the time being properly operated. (R307-415-6g(3)(b))

I.N.2.c During the period of the emergency the permittee took all reasonable steps to minimize levels of emissions that exceeded the emission standards, or other requirements in this permit. (R307-415-6g(3)(c))

I.N.2.d The permittee submitted notice of the emergency to the Executive Secretary within two working days of the time when emission limitations were exceeded due to the emergency. This notice must contain a description of the emergency, any steps taken to mitigate emissions, and corrective actions taken. This notice fulfills the requirement of Provision I.S.2.c below. (R307-415-6g(3)(d))

I.N.3 In any enforcement proceeding, the permittee seeking to establish the occurrence of an emergency has the burden of proof. (R307-415-6g(4))

I.N.4 This emergency provision is in addition to any emergency or upset provision contained in any other section of this permit. (R307-415-6g(5))

I.O **Operational Flexibility.**

Operational flexibility is governed by R307-415-7d(1).

I.P **Off-permit Changes.**

Off-permit changes are governed by R307-415-7d(2).

I.Q **Administrative Permit Amendments.**

Administrative permit amendments are governed by R307-415-7e.

I.R **Permit Modifications.**

Permit modifications are governed by R307-415-7f.

I.S **Records and Reporting.**

I.S.1 Records.

I.S.1.a The records of all required monitoring data and support information shall be retained by the permittee for a period of at least five years from the date of the monitoring sample, measurement, report, or application. Support information includes all calibration and maintenance records, all original strip-charts or appropriate recordings for continuous monitoring instrumentation, and copies of all reports required by this permit. (R307-415-6a(3)(b)(ii))

I.S.1.b For all monitoring requirements described in Section II, Special Provisions, the source shall record the following information, where applicable: (R307-415-6a(3)(b)(i))

I.S.1.b.1 The date, place as defined in this permit, and time of sampling or measurement.

I.S.1.b.2 The date analyses were performed.

I.S.1.b.3 The company or entity that performed the analyses.

I.S.1.b.4 The analytical techniques or methods used.

I.S.1.b.5 The results of such analyses.

I.S.1.b.6 The operating conditions as existing at the time of sampling or measurement.

I.S.1.c Additional record keeping requirements, if any, are described in Section II, Special Provisions.

I.S.2 Reports.

I.S.2.a Monitoring reports shall be submitted to the Executive Secretary every six months, or more frequently if specified in Section II. All instances of deviation from permit requirements shall be clearly identified in the reports. (R307-415-6a(3)(c)(i))

I.S.2.b All reports submitted pursuant to Provision I.S.2.a shall be certified by a responsible official in accordance with Provision I.K of this permit. (R307-415-6a(3)(c)(i)

I.S.2.c The Executive Secretary shall be notified promptly of any deviations from permit requirements including those attributable to upset conditions as defined in this permit, the probable cause of such deviations, and any corrective actions or preventative measures taken. Prompt, as used in this condition, shall be defined as written notification within the number of days shown under "Enforceable Dates and Timelines" at the front of this permit.. Deviations from permit requirements due to unavoidable breakdowns shall be reported in accordance with the provisions of R307-107. (R307-415-6a(3)(c)(ii))

I.S.3 Notification Addresses.

I.S.3.a All reports, notifications, or other submissions required by this permit to be submitted to the Executive Secretary are to be sent to the following address or to such other address as may be required by the Executive Secretary:

Utah Division of Air Quality
P.O. Box 144820
Salt Lake City, UT 84114-4820
Phone: 801-536-4000

I.S.3.b All reports, notifications or other submissions required by this permit to be submitted to the EPA should be sent to one of the following addresses or to such other address as may be required by the Executive Secretary:

For annual compliance certifications:

Environmental Protection Agency, Region VIII
Office of Enforcement, Compliance and Environmental Justice
(mail code 8ENF)
1595 Wynkoop Street
Denver, CO 80202-1129

For reports, notifications, or other correspondence related to permit modifications, applications, etc.:

Environmental Protection Agency, Region VIII
Office of Partnerships & Regulatory Assistance Air & Radiation Program (mail code 8P-AR)
1595 Wynkoop Street
Denver, CO 80202-1129
Phone: 303-312-6440

I.T **Reopening for Cause.**

I.T.1 A permit shall be reopened and revised under any of the following circumstances:

I.T.1.a New applicable requirements become applicable to the permittee and there is a remaining permit term of three or more years. No such reopening is required if the effective date of the requirement is later than the date on which this permit is due to expire, unless the terms and conditions of this permit have been extended pursuant to R307-415-7c(3), application shield. (R307-415-7g(1)(a))

I.T.1.b The Executive Secretary or EPA determines that this permit contains a material mistake or that inaccurate statements were made in establishing the emissions standards or other terms or conditions of this permit. (R307-415-7g(1)(c))

I.T.1.c EPA or the Executive Secretary determines that this permit must be revised or revoked to assure compliance with applicable requirements. (R307-415-7g(1)(d))

I.T.1.d Additional applicable requirements are to become effective before the renewal date of this permit and are in conflict with existing permit conditions. (R307-415-7g(1)(e))

I.T.2 Additional requirements, including excess emissions requirements, become applicable to a Title IV affected source under the Acid Rain Program. Upon approval by EPA, excess emissions offset plans shall be deemed to be incorporated into this permit. (R307-415-7g(1)(b))

I.T.3 Proceedings to reopen and issue a permit shall follow the same procedures as apply to initial permit issuance and shall affect only those parts of this permit for which cause to reopen exists. (R307-415-7g(2))

I.U **Inventory Requirements.**

An emission inventory shall be submitted in accordance with the procedures of R307-150, Emission Inventories. (R307-150)

I.V **Title IV and Other, More Stringent Requirements**

Where an applicable requirement is more stringent than an applicable requirement of regulations promulgated under Title IV of the Act, Acid Deposition Control, both provisions shall be incorporated into this permit. (R307-415-6a(1)(b))

SECTION II: SPECIAL PROVISIONS

II.A **Emission Unit(s) Permitted to Discharge Air Contaminants.**
(R307-415-4(3)(a) and R307-415-4(4))

II.A.1 **Permitted Source**
Source-wide

II.A.2 **Abrasive Blasting General Requirements**
Unit 1 Description: This category includes all non-chemical depainting (NCD) and abrasive blasting (AB) emission units located throughout the base and at Little Mountain.

II.A.3 **Abrasive Blasting Subject to Aerospace NESHAP**
Unit 2 Description: All outer surface area abrasive blasting and non-chemical depainting of aerospace vehicles or components subject to the Aerospace NESHAP (40 CFR 63 Subpart GG). These units are located throughout the base.

II.A.4 **Abrasive Blasting not Subject to Aerospace NESHAP**
Unit 3 Description: All confined and unconfined abrasive blasting and non-chemical depainting emission units not subject to Aerospace NESHAP (40 CFR 63 Subpart GG). These units are located throughout the base.

II.A.5 **Aggregated Aircraft Engine Test Facilities**
Unit 4 Description: All aircraft engine sound suppressors, engine test cells, mobile test stands, hush houses in Buildings 5134, 240, 5184, 5185, 5186, 5187, and 5196, and aircraft engine pickling booths in Building 279

II.A.6 **Gas Turbine Engine Fuel System Testing**
Unit 5 Description: Includes fuel flow test stand in Building 214 and fuel accessory equipment in Building 252 to test fuel system components of various gas turbine engines.

II.A.7 **Hydrazine Exhaust Incinerator**
Unit 6 Description: Single chambered, forced air, propane fired incinerator, adjacent to Bldg 2005, to burn excess hydrazine from testing of Emergency Power Units (EPUs).

II.A.8 **Rocket Engine (Motor) Test Facility**
Unit 7 Description: Rocket motor testing and miscellaneous munition testing in Buildings 1642 and 11647. Exhaust is vented to atmosphere.

II.A.9 **Limited Use Power Supply Units**
Unit 11 Description: IC engines ranging from >11 to <= 1700 KW used to provide mechanical or electric power during emergency situations including: primary electric or mechanical power interruptions, fires, malfunctioning aircraft landings, or others approved by the Executive Secretary.

II.A.10 **Metal Flame Spray Operations**
Unit 12 Description: Includes Two oxygen fuel flame spray booths, the impingement scrubber, Four High Velocity Oxygenated Flame (HVOF) spray booths, the plasma spray waterfall booth, and other grandfathered flame spray equipment located in Building 511

II.A.11 **Metal Plating Subject to Hard Chrome NESHAP**
Unit 13 Description: Chromium electroplating tanks subject to 40 CFR 63 Subpart N, Chromium Electroplating NESHAP. These tanks are located in Building 505 and are controlled by composite

mesh-pad scrubbers.

II.A.12 **Metal Plating Not Subject to Hard Chrome NESHAP**

Unit 15 Description: Cadmium and Nickel plating lines and anodize and anodize stripping lines not subject to 40 CFR 63 Subpart N, Chromium Electroplating NESHAP. These units are located in Building 505 and are controlled by packed bed/composite mesh-pad scrubbers.

II.A.13 **Printed Circuits Plating Line**

Unit 16 Description: Electroplating line in Building 205 to electroplate metals onto printed circuit boards. No unit-specific applicable requirements.

II.A.14 **Solvent Cleaning Machines**

Unit 17 Description: Immersion cold cleaning (Unit 17a and Unit 17b), remote cold cleaning (Unit 17c), and vapor degreasing equipment (Unit 17d and Unit 21) using VOC containing solvent(s) to clean soils and/or grease from parts.

II.A.15 **Immersion Cold Cleaning Equipment > 2 Gallons**

Unit 17a Description: Equipment not included in emission unit's 17b and 18 and not subject to 40 CFR 63 Subpart T where parts are immersed in solvent(s) below its boiling point. Units that include flushing and immersion are included in this emission unit.

II.A.16 **Immersion Cold Cleaning Equipment <= 2 Gallons**

Unit 17b Description: Equipment not subject to 40 CFR 63 Subpart T where parts are immersed in solvent(s) below its boiling point. Does not include emission units with capacities > 2 gallons.

II.A.17 **Remote Cold Cleaning Equipment**

Unit 17c Description: Equipment not subject to 40 CFR 63 Subpart T in which solvent(s) below its boiling point is pumped to a sink-like work area that drains back into an enclosed container, allowing no solvent to pool in the work area.

II.A.18 **Open-Top Vapor Degreasing Equipment**

Unit 17d Description: Equipment not subject to 40 CFR 63 Subpart T which has its upper surface open to air and boils solvent(s) to create a vapor to clean soils and/or grease from parts.

II.A.19 **Cold Solvent Tanks, Building 2013**

Unit 18 Description: Two cold solvent tanks and a 1500-gallon waste solvent storage tank located in Building 2013.

II.A.20 **Curing and Burnout Ovens in Bldg. 843**

Unit 20 Description: Three natural gas-fired curing and burnout ovens.

II.A.21 **Baron Blakeslee Part Cleaner**

Unit 21 Description: Vapor degreaser located in building 279 used to clean dirt and grease from parts. This emission unit is subject to 40 CFR 63, Subpart T.

II.A.22 **IC Engine/Turbine Test Stands**

Unit 23 Description: IC engine/turbine test stands rated above 25 horsepower. These units located in Building 843 & Pad 1723A, can be fired on JP-8, gasoline, or diesel fuel.

II.A.23 **Aircraft Fuel/Oil Purge System**

Unit 24 Description: Closed loop distillation system in bldgs. 287 and 236 used to purge JP-8/JP-5 fuel out of aircraft fuel tanks; includes six storage tanks, two underground and four above ground.

II.A.24 **Carbon Brake Facility**

Unit 25 Description: Abrasive cleaning and brake coating operations with vented hoods and coating booths at the Carbon Brake Facility located in Building 507.

II.A.25 **Surface Coating Operation Group**

Unit 26 Description: Aggregated Aerospace NESHAP surface coating operations and Non Aerospace NESHAP surface coating operations excluding architectural coating and facility maintenance. These units are located at various locations throughout the base.

II.A.26 **Aerospace NESHAP General**

Unit 27 Description: Aggregation of all surface coating operations of aerospace vehicles or components subject to 40 CFR 63 Subpart GG National Emission Standards for Aerospace Manufacturing and Rework Facilities.

II.A.27 **Aerospace NESHAP Chemical Cleaning**

Unit 28 Description: Aggregation of hand-wipe cleaning, spray gun cleaning, and/or flush cleaning of aerospace vehicles or components on base which are subject to 40 CFR 63, Subpart GG National Emission Standards for Aerospace Manufacturing and Rework Facilities.

II.A.28 **Aerospace NESHAP Coating**

Unit 29 Description: Application of primer and topcoat to aerospace vehicles or components subject to 40 CFR 63, Subpart GG National Emission Standards for Aerospace Manufacturing and Rework Facilities.

II.A.29 **Aerospace NESHAP Chemical Depainting**

Unit 30 Description: All outer surface area chemical depainting of aerospace vehicles or components subject to 40 CFR 63, Subpart GG National Emission Standards for Aerospace Manufacturing and Rework Facilities.

II.A.30 **Surface Coating of Miscellaneous Metal Parts**

Unit 31 Description: Non-Aerospace NESHAP surface coating of miscellaneous metal parts and components excluding architectural coating and facility maintenance. These units are located at various locations throughout the base.

II.A.31 **Miscellaneous Operations in Building 238**

Unit 32 Description: Including a 5-axis router, miscellaneous Composite Core Milling Processes, and a baghouse.

II.A.32 **Wood working baghouse in Building 849**

Unit 34 Description: Baghouse to control PM_{10} emissions from wood working operations in Building 849.

II.A.33 **Bake Oven in Building 1701**

Unit 35 Description: Natural gas-fired bake oven rated at 2 MMBTU/hr.

II.A.34 **Aggregated Boiler Group**

Unit 36 Description: 33 natural gas-fired, low NO_x boilers rated from 1.27 to 87.5 MMBTU/hr including those listed in Units 37 and 38 and excluding those listed in Unit 39. Most are capable of combusting diesel, # 2 Fuel Oil, JP-8 and/or JP-10 as backup fuel.

II.A.35 **NSPS Boilers**

Unit 37 Description: Eleven natural gas-fired, low NO_x, boilers rated between 10.5 to 87.5 MMBTU/hr each, capable of combusting diesel, #2 Fuel Oil, JP-8 and/or JP-10 as backup fuel. All these boilers are subject to 40 CFR 60, Subpart Dc.

II.A.36 **Used Oil Boiler in Building 1703**

Unit 38 Description: Used oil boiler rated at 20.9 MMBTU/hr with dual burner (natural gas and used oil). This boiler is capable of combusting diesel, #2 Fuel Oil, JP-8, and/or JP-10 as backup fuel. This boiler is subject to 40 CFR 60, Subpart Dc.

II.A.37 **Grandfathered Boilers**

Unit 39 Description: Sixteen boilers ranging in size from small process boilers to large commercial boilers installed prior to November 29, 1969. These boilers are fueled by natural gas, diesel, #2 Fuel Oil, JP-8 and/or JP-10. All the boilers pre-date 40 CFR 60, Subpart Dc. No unit-specific applicable requirements.

II.A.38 **Solvent Distillation Units**

Unit 40 Description: Two solvent distillation units equipped with a water-cooled shell and tube condensers that must be in operation whenever distillation operations take place.

II.A.39 **Basewide Gasoline Stations and Transfer Operations**

Unit 41 Description: Various gasoline storage tanks equipped with submerged-fill equipment and vapor return line. Various gasoline transporting vehicles operating at the base.

II.A.40 **Melt Furnaces in Building 507**

Unit 42 Description: One 2.5 MMBtu/hr and two 0.350 MMBtu/hr natural gas-fired melt furnaces.

II.A.41 **IWTP- Air Stripper**

Unit 48 Description: Located at the industrial wastewater treatment plant on base, this packed-bed air stripper tower is used to remove VOC and H_2S from wastewater. VOC emissions from the air stream are controlled by carbon adsorption.

II.A.42 **Landfill**

Unit 49 Description: Construction and demolition landfill not subject to NSPS. No unit-specific applicable requirements.

II.A.43 **C130 Air Handlers**

Unit 50 Description: Thirteen natural gas-fired air handlers with Low NO_x burners for the C130 corrosion control facility. Eight of the units are rated at 9.35 MMBtu/hr each and five are rated at 6 MMBtu/hr each.

II.A.44 **Landfill Gas Fired Power Generation Facili**

Unit 51 Description: Landfill gas fueled power generation station consisting of one 814 bhp, one 1148 bhp, and one 1350 bhp lean burn engines powering one 590 KW, one 790 KW, and one 975 KW generator, respectively. The engines are subject to 40 CFR 63 Subpart ZZZZ

II.A.45 **Aboveground JP-8 Fuel Storage Tanks**

Unit 52 Description: One 275,000 gallon, one 1,070,764 gallon, one 2,320,209 gallon, one 366,063 gallon, and one 550,400 gallon aboveground fuel storage tanks with internal floating roofs and primary and secondary seals.

II.A.46 **Plasma Cutting Booth and Baghouse in Build 507**

Unit 53 Description: A plasma cutting booth and baghouse for the demilitarization of aircraft landing gear parts.

II.A.47 **NSPS Compression Ignition Internal Combustion Eng.**

Unit 55 Description: Stationary emergency compression ignition ICE not covered by national

security exemption under 60.4200(d) that are ordered, modified, or reconstructed after July 11, 2005, excluding those ordered that are manufactured before either April 1, 2006, or July 1, 2006 (certified as a NFPA fire pump engines only). These units are located throughout the base.

II.A.48 **NSPS CI ICE Emergency Non Fire Pump Engines**

Unit 56 Description: Stationary emergency compression ignition ICE as defined under Unit 55 that are not certified as a NFPA fire pump engines. These units are located throughout the base.

II.A.49 **NSPS CI ICE Emergency Fire Pump Engines**

Unit 57 Description: Stationary emergency compression ignition ICE as defined under Unit 55 that are certified as a NFPA fire pump engines. These units are located throughout the base.

II.A.50 **NSPS Spark Ignition Internal Combustion Engines**

Unit 58 Description: Stationary emergency spark ignition ICE, except those covered by national security exemption under 40 CFR 60.4230(e) or classified as temporary replacement unit under 40 CFR 60.4230(f), that are ordered, modified, or reconstructed after June 12, 2006. These units are subject to 40 CFR Subpart JJJJ located throughout the base.

II.B Requirements and Limitations

The following emission limitations, standards, and operational limitations apply to the permitted facility as indicated:

II.B.1 **Conditions on permitted source (Source-wide).**

II.B.1.a **Condition:**

Sulfur content of any fuel oil combusted shall be no greater than 0.85 pounds sulfur per MMBtu gross heat input unless otherwise specified in this permit. [Authority granted under R307-203-1(1); condition originated in R307-203-1(1)].

II.B.1.a.1 **Monitoring:**

For each delivery of oil, the permittee shall either:

(1) Determine the fuel sulfur content expressed as lb/MMBtu in accordance with the methods of the American Society for Testing Materials (ASTM) and Equation 1;

(2) Inspect the fuel sulfur content expressed as lb/MMBtu determined by the vendor using methods of the ASTM and Equation 1; or

(3) Inspect documentation provided by the vendor that indirectly demonstrates compliance with this provision.

Equation 1:

Fuel Sulfur Content, lb/MMBtu = [(Weight percent sulfur/100) x Density (lb/gal)] / [(gross heating value (Btu/gal)) x (1 MMBtu/1,000,000 Btu)]

II.B.1.a.2 **Recordkeeping:**

The records required for monitoring shall be maintained as described by Provision S.1 in Section I of this permit.

II.B.1.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.1.b **Condition:**

At all times, including periods of startup, shutdown, and malfunction, the permittee shall, to the extent practicable, maintain and operate any permitted plant equipment, including associated air pollution control equipment, in a manner consistent with good air pollution control practice for minimizing emissions. Determination of whether acceptable operating and maintenance procedures are being used will be based on information available to the Executive Secretary which may include, but is not limited to, monitoring results, opacity observations, review of operating and maintenance procedures, and inspection of the source. [Authority granted under R307-401-8(2) and 40 CFR 60.11(d); condition originated in 40 CFR 60.11(d)].

II.B.1.b.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.1.b.2 **Recordkeeping:**

Permittee shall document activities performed to assure proper operation and maintenance. Records shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.1.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.1.c **Condition:**

The permittee shall comply with the applicable requirements for servicing of motor vehicle air conditioners pursuant to 40 CFR 82, Subpart B - Servicing of Motor Vehicle Air Conditioners. [Authority granted under 40 CFR 82.30(b); condition originated in 40 CFR 82 Subpart B].

II.B.1.c.1 **Monitoring:**

The permittee shall certify, in the annual compliance statement required in Section I of this permit, its compliance status with the requirements of 40 CFR 82, Subpart B.

II.B.1.c.2 **Recordkeeping:**

All records required in 40 CFR 82, Subpart B shall be maintained consistent with the requirements of Provision S.1 in Section I of this permit.

II.B.1.c.3 **Reporting:**

All reports required in 40 CFR 82, Subpart B shall be submitted as required. There are no additional reporting requirements except as specified in Section I of this permit.

II.B.1.d **Condition:**

The permittee shall comply with the applicable requirements for recycling and emission reduction for class I and class II refrigerants and their substitutes pursuant to 40 CFR 82, Subpart F - Recycling and Emissions Reduction. [Authority granted under 40 CFR 82.150(b); condition originated in 40 CFR 82 Subpart F].

II.B.1.d.1 **Monitoring:**

The permittee shall certify, in the annual compliance statement required in Section I of this permit, its compliance status with the requirements of 40 CFR 82, Subpart F.

II.B.1.d.2 **Recordkeeping:**

All records required in 40 CFR 82, Subpart F shall be maintained consistent with the requirements of Provision S.1 in Section I of this permit.

II.B.1.d.3 **Reporting:**

All reports required in 40 CFR 82, Subpart F shall be submitted as required. There are no additional reporting requirements except as specified in Section I of this permit.

II.B.1.e **Condition:**

Visible emissions shall be no greater than 20 percent opacity for those affected emission units constructed or installed after April 25, 1971, unless otherwise specified in this permit or R307-201-3(7). [Authority granted under R307-201-3(2); condition originated in R307-201-3].

II.B.1.e.1 **Monitoring:**

Unless otherwise specified, a visual opacity survey of each affected emission unit shall be performed on a quarterly basis while the unit is operating. The visual opacity survey shall be performed by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If visible emissions other than condensed water vapor are observed from an emission unit, an opacity determination of that emission unit shall be performed by a certified observer within 24 hours of the initial survey. The opacity determination shall be performed in accordance with 40 CFR 60, Appendix A, Method 9.

The permittee is not required to perform quarterly surveys on sources that do not have the potential to generate opacity (no-opacity sources) such as combustion sources operating on natural gas or propane, petroleum storage tanks, paint booths, fuel/oil purge system, and solvent cleaning units. For these no-opacity sources, proper documentation of natural gas / propane use, tank content, or solvent use shall be maintained in accordance with the requirements of Provisions S.1 in Section I of this permit.

II.B.1.e.2 **Recordkeeping:**

Results of monitoring shall be maintained as described in Provision I.S.1 of this permit as well as in 40 CFR 60 Appendix A, Method 9.

II.B.1.e.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.1.f **Condition:**

Visible emissions shall be no greater than 40 percent opacity for those affected emission units constructed or installed on or before April 25, 1971, unless otherwise specified in this permit or R307-201-3(7). [Authority granted under R307-201-3(1); condition originated in R307-201-3].

II.B.1.f.1 **Monitoring:**

Unless otherwise specified, a visual opacity survey of each affected emission unit shall be performed on a quarterly basis while the unit is operating. The visual opacity survey shall be performed by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If visible emissions other than condensed water vapor are observed from an emission unit, an opacity determination of that emission unit shall be performed by a certified observer within 24 hours of the initial survey. The opacity determination shall be performed in accordance with 40 CFR 60, Appendix A, Method 9.

The permittee is not required to perform quarterly surveys on sources that do not have the potential to generate opacity (no-opacity sources) such as combustion sources operating on natural gas or propane, petroleum storage tanks, paint booths, fuel/oil purge system, and solvent cleaning units. For these no-opacity sources, proper documentation of natural gas / propane use, tank content, or solvent use shall be maintained in accordance with the requirements of Provisions S.1 in Section I of this permit.

II.B.1.f.2 **Recordkeeping:**

Results of monitoring shall be maintained as described in Provision I.S.1 of this permit as well as in 40 CFR 60 Appendix A, Method 9.

II.B.1.f.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.1.g **Condition:**

Records shall be maintained of the material (salt, crushed slag, or sand) applied to the roads by the permitted source. [Authority granted under R307-307; condition originated in R307-307-1].

II.B.1.g.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.1.g.2 **Recordkeeping:**

The following records shall be maintained as outlined in Provision I.S.1 of this permit:

For Salt - the quantity applied, the percent by weight of insoluble solids in the salt, and the percentage of the material that is sodium chloride (NaCl).

For Sand or Crushed Slag - the quantity applied and the percent by weight of fine material which passes the number 200 sieve in a standard gradation analysis.

II.B.1.g.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.1.h **Condition:**

The permittee shall comply with the applicable requirements for emission reduction for halons pursuant to 40 CFR 82, Subpart H, Halon Emission Reduction. [Authority granted under 40 CFR 82.250(b); condition originated in 40 CFR 82, Subpart H].

II.B.1.h.1 **Monitoring:**

The permittee shall certify, in the annual compliance statement required in Section I of this permit, its compliance status with the requirements of 40 CFR 82, Subpart H.

II.B.1.h.2 **Recordkeeping:**

All records required in 40 CFR 82, Subpart H shall be maintained consistent with the requirements of Provision S.1 in Section I of this permit.

II.B.1.h.3 **Reporting:**

All reports required in 40 CFR 82, Subpart H shall be submitted as required. There are no additional reporting requirements except as specified in Section I of this permit.

II.B.1.i **Condition:**

Emissions from the applicable sources of fugitive dust listed in R307-205-5 shall be minimized. [Authority granted under R307-205-5; condition originated in R307-205-5].

II.B.1.i.1 **Monitoring:**

Adherence to the most recently approved fugitive dust control plan shall be monitored to demonstrate that appropriate measures are being implemented to control fugitive dust.

II.B.1.i.2 **Recordkeeping:**

Records required by the most recently approved fugitive dust control plan shall be maintained in accordance with the plan and section I.S.1 of this permit.

II.B.1.i.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.2 **Conditions on Abrasive Blasting General Requirements (Unit #1).**

II.B.2.a **Condition:**

The throughput of media shall not exceed 2,350 tons per rolling 12-month period from externally vented abrasive cleaning and non-chemical depainting at HAFB and Little Mountain. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121167-04].

II.B.2.a.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.2.a.2 **Recordkeeping:**

The quantity of media added and date shall be recorded each time blasting media is added to externally vented abrasive cleaning equipment. These records can utilize purchase records, operation logs, and/or inventory records as a basis to determine blasting media throughput. By the 30th day of each month (28th for February), the permittee shall calculate a new 12-month total, using the throughput data from the previous 12 months. The records required by this condition may be kept in electronic form and shall maintained in accordance with Provision I.S.1 of this permit.

II.B.2.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.2.b **Condition:**

Flexibility Provisions - HAFB is allowed to add or modify any blasting equipment at the Main Base or Little Mountain, provided that each of the following conditions are met:

1. The proposed addition or modification does not cause an increase in the currently established base-wide (including Little Mountain) allowable PM_{10} and HAP emissions limit of 1.62 tons per rolling 12 month total of PM_{10} and 0.0063 tons per rolling 12 month total of combined HAP's.

2. The new or modified installation or piece of equipment must meet the corresponding Pre-Approved BACT determination provided in Appendix 1 of the cited approval order. If new BACT for this type of process is established, DAQ has the right to re-open the cited approval order to change BACT for this process accordingly. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121167-04].

II.B.2.b.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.2.b.2 **Recordkeeping:**

Records of the notifications required by this condition shall be maintained consistent with the requirements of Provision S.1 in Section I of this permit.

II.B.2.b.3 **Reporting:**

In addition to the reporting requirements in Section I of this permit, the permittee shall provide the following notifications.

1. Notification of new equipment installation must be submitted to DAQ seven days prior to such installation. Relocation or removal of equipment which does not involve a modification (increase in emissions or installation of new air pollution control equipment) will not require prior notification. Notification shall include equipment size, type, location, whether it is applicable to federal standards, conformity with BACT Standards, estimated emissions, impact of estimated emissions from equipment to the emissions limit in this permit.

2. A copy of any pertinent testing protocols, as required by the Pre-Approved BACT (i.e., initial compliance testing for new pollution control equipment) must be included with the notification. Where applicable, initial compliance testing must be performed within 180 days of the start up of the new emission source.

3. Hill shall generate a list of all operating blasting equipment (equipment list) that is subject to state and federal rules within three working days upon request from a representative of the executive secretary. This equipment list shall contain abrasive blasting equipment type, NESHAP¿s applicability, location and equipment identification numbers.

II.B.3 **Conditions on Abrasive Blasting Subject to Aerospace NESHAP (Unit #2).**

II.B.3.a **Condition:**

Visible emissions from abrasive blasting operations subject to the Aerospace NESHAP shall not exceed 40 percent opacity for more than three minutes in any one-hour period. [Authority granted under R307-206; condition originated in DAQE-AN0121167-04].

II.B.3.a.1 **Monitoring:**

Once per month the permittee shall apply one of the following monitoring techniques to each affected emission unit:

A. A visual opacity survey conducted by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If visible emissions other than condensed water vapor are observed from an emission unit, an opacity determination of that emission unit shall be performed by a certified observer within 24 hours of the initial survey. The opacity determination shall be performed in accordance with 40 CFR 60, Appendix A, Method 9 and in accordance with the following provision:

1. Emissions from confined blasting shall be read at the densest point after the air contaminant leaves the enclosure by a certified Method 9 observer within 24 hours of the initial visual emission observation.

B. A photogrametric opacity determination shall be conducted by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9 while the blasting operation is occurring. If an opacity of 15 percent or more is detected by the photogrametric analysis, an opacity determination of that emission point shall be performed by a certified observer in accordance with 40 CFR 60, Appendix A, Method 9 within 24 hours of the initial survey and in accordance with the following provision:

1. Emissions from confined blasting shall be read at the densest point after the air contaminant leaves the enclosure by a certified Method 9 observer within 24 hours of the initial visual emission observation.

Either of the above monitoring techniques may be applied to different affected emission units or to a given affected emission unit from month to month.

II.B.3.a.2 **Recordkeeping:**

The permittee shall maintain a log of visual opacity surveys and/or photogrametric observations which include the following information for each affected emission points checked: the date and time of each visual opacity survey or photogrametric observation, the specific monitoring technique used (opacity survey or photogrametric observation) and the result of the opacity monitoring. The records required by this provision and all data required by EPA Method 9 shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.3.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.3.b **Condition:**

(1) Each aerospace depainting operation subject to this condition shall emit no organic HAP from chemical stripping formulations and agents or chemical paint softeners, except as provided in paragraph (2) below and 40 CFR 63.746(b)(3) (see Aerospace NESHAP Chemical Depainting condition in this permit):

(2) Where non-chemical based equipment is used to comply with paragraph (1), either in total or in part, the permittee shall operate and maintain the equipment according to the manufacturer's specifications or locally prepared operating procedures. During periods of malfunctions of such equipment, the permittee may use substitute materials during the repair period provided the substitute materials used are those available that minimize organic HAP emissions. In no event shall substitute materials be used for more than 15 days annually, unless such materials are organic HAP-free.

(3) The permittee shall comply with the following requirements for each non-chemical depainting operation that generates airborne inorganic HAP emissions from dry media blasting equipment, as specified in 40 CFR 63.746 (b)(4)(i) through (b)(4)(v):

(i) Perform the depainting operation in an enclosed area.
(ii) Pass any air stream removed from the enclosed area through a dry particulate filter system, baghouse, or waterwash system before exhausting it to the atmosphere.
(iii) If a dry particulate filter system is used, the following requirements shall be met:
(A) Maintain the system in good working order;
(B) Install a differential pressure gauge across the filter banks;
(C) Continuously monitor the pressure drop across the filter; and
(D) Take corrective action when the pressure drop exceeds or falls below the filter manufacturer's recommended limits.
(iv) If a waterwash system is used, continuously monitor the water flow rate.
(v) If the pressure drop, as recorded pursuant to 40 CFR 63.752(e)(7), is outside the limit(s) specified by the filter manufacturer or in locally prepared operating procedures, whichever is more stringent, shut down the operation immediately and take corrective action. If the water path in the waterwash system fails the visual continuity/flow characteristics check as recorded pursuant to 40 CFR 63.752(e)(7), or the water flow rate, as recorded pursuant to 40 CFR 63.752(d)(2), exceeds the limit(s) specified by the booth manufacturer or in locally prepared operating procedures, or the booth manufacturer's or locally prepared maintenance procedures for the filter or waterwash system have not been performed as scheduled, shut down the operation immediately and take corrective action. The operation shall not be resumed until the pressure drop or water flow rate is returned within the specified limit(s). [Authority granted under 40 CFR 63.746(b); condition originated in DAQE-AN0121167-04].

II.B.3.b.1 **Monitoring:**

If a dry particulate filter is used to meet the requirements of this permit condition, the permittee shall install a differential pressure gauge across the filter banks and, while non-chemical depainting operations are occurring, continuously monitor the pressure drop across the particulate filters. The permittee shall read and record the pressure drop once per shift in accordance with the recordkeeping requirements of 40 CFR 63.752(e).

If a pumpless waterwash system is used to meet the requirements of this permit condition, the permittee shall, while non-chemical depainting operations are occurring, measure and record the parameter(s) recommended by the booth manufacturer that indicate booth performance once per shift, in accordance with the recordkeeping requirements of 40 CFR 63.752(e).

If a waterwash system is used, the permittee shall continuously monitor the water flow rate, and read and record the water flow rate once per shift in accordance with the recordkeeping

requirements of 40 CFR 63.752(e).

If the pressure drop, as recorded pursuant to 40 CFR 63.752(e)(7), is outside the limit(s) specified by the filter manufacturer or in locally prepared operating procedures, whichever is more stringent, the permittee shall shut down the operation immediately and take corrective action.

If the water path in the waterwash system fails the visual continuity/flow characteristics check, as recorded pursuant to 40 CFR 63.752(e)(7), or if the water flow rate, as recorded pursuant to 40 CFR 63.752(d)(2), exceeds the limit(s) specified by the booth manufacturer or in locally prepared operating procedures, or if the recommended maintenance procedures for the filter or waterwash system have not been performed as scheduled, the permittee shall shut down the operation immediately and take corrective action. The operation shall not be resumed until the pressure drop or water flow rate is returned within the specified limit(s).

II.B.3.b.2 **Recordkeeping:**

For affected emission units subject to the depainting standards specified in 40 CFR 63.746, the permittee shall record the following information, as appropriate, in accordance with paragraphs (e)(1), (e)(4), (e)(5), and (e)(7) of 40 CFR 63.752:

(1) For each type of aircraft depainted at the facility, a listing of the parts, subassemblies, and assemblies normally removed from the aircraft before depainting. Prototype, test model or aircraft that exist in low numbers (i.e., less than 25 aircraft of any one type) are exempt from this requirement.

(2) If dry media blasting equipment is used to comply with the organic HAP emission limit specified in 40 CFR 63.746(b)(1):

(i) The names and types of non-chemical based equipment; and

(ii) For periods of malfunction,

(A) The non-chemical method or technique that malfunctioned;
(B) The date that the malfunction occurred;
(C) A description of the malfunction;
(D) The methods used to depaint aerospace vehicles during the malfunction period;
(E) The dates that these methods were begun and discontinued; and
(F) The date that the malfunction was corrected.

(3) The permittee shall record the actual pressure drop across the particulate filters or the visual continuity of the water curtain and water flow rate for conventional waterwash systems once each shift in which the depainting process is in operation. For pumpless waterwash systems, the owner or operator shall record the parameter(s) recommended by the booth manufacturer that indicate the performance of the booth once per shift in which the depainting process is in operation. This log shall include the acceptable limit(s) of the pressure drop as specified by the filter manufacturer, the visual continuity of the water curtain and the water flow rate for conventional waterwash systems, or the recommended parameter(s) that indicate the booth performance for pumpless systems as specified by the booth manufacturer or in locally prepared operating procedures.

The log shall be maintained in accordance with the requirements of Provision S.1 in Section I of this permit.

II.B.3.b.3 **Reporting:**

(1) The permittee shall submit semiannual reports occurring every 6 months from the date of the notification of compliance status that identify:

(i) Any new non-chemical depainting technique in use at the base since the notification of compliance status or any subsequent semiannual report was filed;

(ii) For periods of malfunctions:

(A) The non-chemical method or technique that malfunctioned;
(B) The date that the malfunction occurred;
(C) A description of the malfunction;
(D) The methods used to depaint aerospace vehicles during the malfunction period;
(E) The dates that these methods were begun and discontinued; and
(F) The date that the malfunction was corrected;

(iii) All periods where a non-chemical depainting operation subject to 40 CFR 63.746 (b)(2) and (b)(4) for the control of inorganic HAP emissions was not immediately shut down when the pressure drop, water flow rate, or recommended booth parameter(s) was outside the limit(s) specified by the filter or booth manufacturer or in locally prepared operational procedures;

(iv) A list of new and discontinued aircraft models depainted at the base over the last 6 months and a list of the parts normally removed for depainting for each new aircraft model being depainted; and

(v) If the depainting operation has been in compliance for the semiannual period, a statement signed by a responsible company official that the depainting operation was in compliance with the applicable standards. The semiannual report shall also include a statement of compliance signed by a responsible company official certifying that the facility is in compliance with all applicable requirements.

Semiannual compliance reports for each type of operation subject to Subpart GG (i.e. cleaning, primer and topcoat application, depainting, chemical milling maskant application) can be combined into a single semiannual compliance report.

(2) The permittee shall submit annual reports occurring every 12 months from the date of the notification of compliance status that identify:

(i) The number of times the pressure drop limit(s) for each filter system or the number of times the water flow rate limit(s) for each waterwash system were outside the limit(s) specified by the filter or booth manufacturer or in locally prepared operating procedures.

II.B.4 **Conditions on Abrasive Blasting not Subject to Aerospace NESHAP (Unit #3).**

II.B.4.a **Condition:**

(a) All non-NESHAP abrasive blasting operations shall comply with at least one of the following performance standards:

(1) Confined blasting;
(2) Wet abrasive blasting;
(3) Hydroblasting; or
(4) Unconfined blasting using abrasives as defined in paragraph (b).

(b) Abrasives used for dry unconfined blasting referenced in paragraph (a)(4) above shall comply with the following performance standards:
(1) Before blasting the abrasive shall not contain more than 1% by weight material passing a #70 U.S. Standard sieve.
(2) After blasting the abrasive shall not contain more than 1.8% by weight material 5 micron or smaller.
(3) Abrasives reused for dry unconfined blasting are exempt from paragraph (b)(2), but must conform with paragraph (b)(1).

(c) If using the performance standard of paragraph (a)(4), the permittee must demonstrate that the abrasives were obtained from persons that have certified (submitted test results) to the Executive Secretary at least annually that such abrasives meet the requirements of paragraph (b) above. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121167-04 and R307-306-6].

II.B.4.a.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.4.a.2 **Recordkeeping:**

Documentation that demonstrates adherence to the performance standards of this condition shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.4.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.4.b **Condition:**

Visible emissions shall be no greater than 10 percent opacity from any point or fugitive source associated with non-NESHAP abrasive blasting operations. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121167-04 and R307-206-4].

II.B.4.b.1 **Monitoring:**

Once per month the permittee shall apply the following monitoring technique to each affected emission unit:

A visual opacity survey conducted by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If visible emissions other than condensed water vapor are observed from an emission unit, an opacity determination of that emission unit shall be performed by a certified observer within 24 hours of the initial survey. The opacity determination shall be performed in accordance with 40 CFR 60, Appendix A, Method 9 in accordance with the following provisions:

(1) Visible emissions shall be measured using EPA Method 9. Visible emissions from intermittent sources shall use procedures similar to Method 9, but the requirement for observations to be made at 15 second intervals over a six-minute period shall not apply.

(2) Visible emissions from unconfined blasting shall be measured at the densest point of the emission after a major portion of the spent abrasive has fallen out, at a point not less than five feet nor more than twenty-five feet from the impact surface from any single abrasive blasting nozzle.
(3) An unconfined blasting operation that uses multiple nozzles shall be considered a single source unless it can be demonstrated by the owner or operator that each nozzle, measured separately, meets the emission and performance standards provided in R307-206-2 through 4.
(4) Visible emissions from confined blasting shall be measured at the densest point after the air contaminant leaves the enclosure.

II.B.4.b.2 **Recordkeeping:**

The permittee shall record the date of each visual survey. The permittee shall also keep a log of the following information for each observed visual emission: date and time visual emissions observed, emission point location and description, time and date of opacity determination, and percent opacity. The records required by this provision and all data required by 40 CFR 60, Appendix A, Method 9 shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.4.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.5 **Conditions on Aggregated Aircraft Engine Test Facilities (Unit #4).**

II.B.5.a **Condition:**

The total emissions from all of the Jet Engine Testing, JP-8 Auxiliary Power Testing, and Engine Depickling operations on the base, combined, shall not exceed the following emission limits:

Pollutant	Tons / Rolling 12-Month Period
PM_{10}	4.5
SO_2	8.1
NO_x	64.0
CO	48.0
VOC	24.0. [Authority granted under R307-401-8(1)(a) [BACT]; condition originated in DAQE-AN0101210182-07].

II.B.5.a.1 **Monitoring:**

Data required for recordkeeping shall be used to determine the monthly rolling 12-month total emissions using JETS emission estimating software or equivalent emission estimating methodology approved by the Executive Secretary. By the 30th day of each month, (or the 28th for February), the permittee shall calculate a new monthly rolling 12-month total for each pollutant using the data from the previous 12 months.

II.B.5.a.2 **Recordkeeping:**

Records of all jet engine tests shall be kept on a daily basis, when in operation. For each jet engine test, the type of engine, date and time of test and duration of the test in each test mode (idle, intermediate, military and afterburner, as applicable) shall be recorded in a test log kept at the test site. For Auxiliary Power Unit Testing and depickling operations, the permittee shall record, on a monthly basis (when in operation), the total fuel consumption and/or the total minutes of operation. These records, along with all the input and the output from the emissions estimating software or approved methodology for each pollutant shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.5.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.5.b **Condition:**

Visible emissions, from Jet Engine Testing and JP-8 Auxiliary Power Testing, shall be no greater than 20 percent opacity except for a period not exceeding 1 minute in any hour. [Authority granted under R307-401- 8(1) [BACT]; condition originated in DAQE-AN0101210182-07].

II.B.5.b.1 **Monitoring:**

In lieu of monitoring via visible emission observations, activities shall be monitored to ensure the proper operation and maintenance of the jet engines being tested.

II.B.5.b.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.5.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.6 **Conditions on Gas Turbine Engine Fuel System Testing (Unit #5).**

II.B.6.a **Condition:**

The combined amount of makeup calibration fluid added to fuel system testing equipment in Buildings 214 and 252 shall be no greater than 13100 gallons per rolling 12-month period. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-210-02].

II.B.6.a.1 **Monitoring:**

The amount of makeup calibration fluid added to each of the fuel testing systems in Buildings 214 and 252 shall be monitored on a monthly basis. By the 15th day of each calendar month, the monthly rolling 12-month total shall be calculated based on the previous 12 months of data.

II.B.6.a.2 **Recordkeeping:**

The records required for monitoring shall be maintained as described by Provision S.1 in Section I of this permit.

II.B.6.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.7 **Conditions on Hydrazine Exhaust Incinerator (Unit #6).**

II.B.7.a **Condition:**

The number of Emergency Power Unit (EPU) test firings shall be no greater than 520 test firings per rolling 12-month period. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121174-06].

II.B.7.a.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.7.a.2 **Recordkeeping:**

The permittee shall maintain a log of the date of each test firing. By the 30th day (28th day for February) of each month, a rolling 12-month total shall be determined using records from the previous 12-months. The Log and results of monitoring shall be maintained as described in Provision I.S.1 of this permit.

II.B.7.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.7.b **Condition:**

Combustion temperature of the incinerator shall be no less than 1800 degrees F during operation. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121174-06].

II.B.7.b.1 **Monitoring:**

A verification of the incinerator combustion chamber temperature shall be performed via the external temperature gauge each day that test firing commences. This data shall be documented in a test log. The verification shall be performed by having an operator visually monitor the external temperature gauge to confirm that the Emergency Power Unit (EPU) test system will not proceed with testing until the temperature reaches 1,800 degrees F.

II.B.7.b.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.7.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.8 **Conditions on Rocket Engine (Motor) Test Facility (Unit #7).**

II.B.8.a **Condition:**

The combined net explosive weight (NEW) of all miscellaneous munitions tested shall be no greater than 1000 lbs per rolling 12-month period. This limit applies to all munitions with a NEW of 5 pounds or more. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-130-01].

II.B.8.a.1 **Monitoring:**

The permittee shall monitor the net explosive weight (NEW) from miscellaneous munitions testing operations on a daily basis when operations occur. By the 15th day of each month, the permittee shall calculate the total NEW for the previous 12 months.

II.B.8.a.2 **Recordkeeping:**

The permittee shall maintain a log of all miscellaneous munitions fired. The log can be in either electronic or written form as long as it contains the following information:

(a) The dates and the type of munition fired.
(b) The number of munitions fired.
(c) The net explosive weight for each munition fired.
(d) The total NEW from all miscellaneous munitions fired shall be calculated and recorded by the 15th of each month.

II.B.8.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.8.b **Condition:**

The combined net explosive weight (NEW) of all rocket motors tested in the Rocket Motor Test Facility (Building 11647) shall be no greater than 19,600 pounds per rolling 12-month period.

The maximum daily NEW is limited to the following schedule based on the anticipated wood/coal burn conditions for Salt Lake/Davis Counties during the No-Burn Season (November 1 through March 31) and on the forecasted Clearing Index for Davis/Weber Counties the remainder of the year (April 1 through Oct 31):

- 655 pounds net explosive weight (NEW) per day on Green Burn days or days with a Clearing Index above 500.

- 399 pounds net explosive weight (NEW) per day on Yellow Burn days or days with a Clearing Index between 500 and 200.

- No test firings shall be allowed on Red Burn days or days with a Clearing Index below 200.

The most restrictive condition (for PM_{10} or CO) will be used to determine the daily NEW limit. Any combination of rocket motors can be tested as long as the NEW restrictions are satisfied. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-130-01].

II.B.8.b.1 **Monitoring:**

The permittee shall monitor the anticipated wood/coal burn conditions for Salt Lake/Davis Counties during the No-Burn Season (November 1 through March 31) and the forecasted Clearing Index for Davis/Weber Counties the remainder of the year (April 1 through Oct 31). The permittee shall also monitor the net explosive weight (NEW) from rocket motor testing operations on a daily basis when operations occur. By the 15th day of each month, the rolling 12-month total NEW shall be calculated for all rocket motor testing operations.

II.B.8.b.2 **Recordkeeping:**

The permittee shall maintain a log of all rocket motors firings. The log can be in either electronic or written form as long as it contains the following information:

(a) The dates and the type of rocket fired.
(b) The number of rockets fired.
(c) The net explosive weight for each rocket fired.
(d) As appropriate, either the burn condition (PM_{10} and CO) for Salt Lake/Davis Counties or the predicted Clearing Index for the Davis-Weber Area at the time of each test.
(e) The total NEW from all rocket motors tested shall be calculated and recorded by the 15th of each month.

II.B.8.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.9 **Conditions on Limited Use Power Supply Units (Unit #11).**

II.B.9.a **Condition:**

The permittee shall not exceed 8,670 combined hours of maintenance-related operations per rolling 12-month period for all the limited use power supply units combined. No single limited use power supply unit shall exceed 500 hours of maintenance-related operation per rolling 12-month period unless otherwise specified. [Authority granted under R307-401(6) [BACT]; condition originated in DAQE-AN0121175-06].

II.B.9.a.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.9.a.2 **Recordkeeping:**

Hours of operation for each limited use power supply unit on base shall be monitored and recorded on a monthly basis in an operation and maintenance log. Records shall distinguish between maintenance-related hours and limited use-related hours. A description of the limited use hours shall also be provided (e.g. electric or mechanical power interrupted, fire, etc.). By the 30th day of each month (28th for February), a monthly rolling 12-month total shall be calculated for each unit and for the total of all units using the data from the previous 12 months. Results of monitoring shall be maintained as described in Provision I.S.1 of this permit.

II.B.9.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.9.b **Condition:**

Sulfur content of the diesel fuels combusted shall be no greater than 0.5 percent by weight. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121175-06].

II.B.9.b.1 **Monitoring:**

For each delivery of diesel fuel, the permittee shall either:

(1) Determine the fuel sulfur content expressed as wt% in accordance with the methods of the American Society for Testing Materials (ASTM);

(2) Inspect the fuel sulfur content expressed as wt% determined by the vendor using methods of the ASTM; or

(3) Inspect documentation provided by the vendor that indirectly demonstrates compliance with this provision.

II.B.9.b.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.9.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.9.c **Condition:**

Visible emissions from diesel-fired limited use power supply units shall be no greater than 20 percent opacity except for a period not exceeding 3 minute in any hour. [Authority granted under R307-401(6) [BACT]; condition originated in DAQE-AN0121175-06].

II.B.9.c.1 **Monitoring:**

A. For emission units operating on natural gas only, in lieu of monitoring via visible emission observations the permittee shall monitor fuel usage to demonstrate that only pipeline-quality natural gas is being used as fuel.

B. For all other emission units operating on fuel other than natural gas, the permittee shall apply one of the following monitoring techniques to each affected emission unit when in operation:

(1) Monthly visual opacity survey conducted by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If any visible emissions other than condensed water vapor are observed from an emission point, an opacity determination of that emission point shall be performed in accordance with 40 CFR 60, Method 9 within 24 hours of the initial visual opacity survey or upon startup if the unit must be shutdown for maintenance. If the unit must be permanently removed from service, no follow-up opacity determination is required.

(2) Quarterly photogrametric opacity observations conducted by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If an opacity of 15 percent or more is detected by the photogrametric analysis, an opacity determination of that emission point shall be performed in accordance with 40 CFR 60, Appendix A, Method 9 within 24 hours of the initial photogrametric opacity observation or upon startup if the unit must be shutdown for maintenance. If the unit must be permanently removed from service, no follow-up opacity determination is required.

(3) An annual opacity determination performed in accordance with 40 CFR 60, Appendix A, Method 9.

The monitoring option selected can vary from unit to unit. For example, if quarterly photogrametric opacity observations are being conducted for a given unit and the permittee cannot conduct a photogrametric opacity observation in a quarter that unit operated, an opacity determination conducted in accordance with the procedures of 40 CFR 60, Appendix A, Method 9 will satisfy the monitoring requirements of this condition.

II.B.9.c.2 **Recordkeeping:**

For emission units fired on natural gas, the permittee shall maintain records such as gas bills, and gas meter readings to demonstrate natural gas usage. Records shall be maintained as described in Provision I.S of this permit.

For all other emission units, the permittee shall maintain a log of monthly visual opacity surveys, quarterly photogrametric observations, and/or annual opacity determinations which includes the following information for each affected emission unit: the date and time of each visual opacity survey, photogrametric opacity observation, annual opacity determination, the specific monitoring technique used (visual opacity survey, 40 CFR 60 Appendix A Method 9, or photogrametric observation) and the result of the opacity monitoring. The records required by this provision and all data required by 40 CFR 60, Appendix A, Method 9 shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.9.c.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.9.d **Condition:**

For each gasoline-fired engine affected emission unit, the permittee shall not allow, cause or permit visible emissions. [Authority granted under R307-201-3(4); condition originated in R307-201-3(4)].

II.B.9.d.1 **Monitoring:**

The permittee shall apply one of the following monitoring techniques to each gasoline-fired engine affected emission unit when in operation:

(1) Monthly visual opacity survey conducted by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If any visible emissions other than condensed water vapor are observed from an emission point, an opacity determination of that emission point shall be performed in accordance with 40 CFR 52.128, Appendix A, Method 203C within 24 hours of the initial visual opacity survey or upon startup if the unit must be shutdown for maintenance. If the unit must be permanently removed from service, no follow-up opacity determination is required.

(2) Quarterly photogrametric opacity observations conducted by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If an opacity is detected by the photogrametric analysis, an opacity determination of that emission point shall be performed in accordance with 40 CFR 52.128, Appendix A, Method 203C within 24 hours of the initial photogrametric opacity observation or upon startup if the unit must be shutdown for maintenance. If the unit must be permanently removed from service, no follow-up opacity determination is required.

(3) An annual opacity determination performed in accordance with 40 CFR 52.128, Appendix A, Method 203C.

The monitoring option selected can vary from unit to unit. For example, if quarterly photogrametric opacity observations are being conducted for a given unit and the permittee cannot conduct a photogrametric opacity observation in a quarter that unit operated, an opacity determination conducted in accordance with the procedures of 40 CFR 52.128, Appendix A, Method 203C will satisfy the monitoring requirements of this condition.

II.B.9.d.2 **Recordkeeping:**

The permittee shall maintain a log of monthly visual opacity surveys, quarterly photogrametric observations, and/or annual opacity determinations which includes the following information for each affected emission unit: the date and time of each visual opacity survey, photogrametric opacity observation, annual opacity determination, the specific monitoring technique used (visual opacity survey, 40 CFR 52.128, Appendix A, Method 203C, or photogrametric observation) and the result of the opacity monitoring. The records required by this provision and all data required by 40 CFR 52.128, Appendix A, Method 203C shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.9.d.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.9.e **Condition:**

Flexibility Provisions - HAFB is allowed to add or modify any limited use power supply units, provided that each of the following conditions are met:
1. The proposed addition or modification does not cause an increase in the currently established base-wide 8,670 combined hours of maintenance-related operations per rolling 12-month period for all the limited use power supply units combined.
2. The new or modified installation or piece of equipment must be properly operated and maintained. If new BACT for this type of process is established, DAQ has the right to re-open this permit to change BACT for this process accordingly. [Authority granted under R307- 401- 8(1) [BACT]; condition originated in DAQE-AN0121175-06].

II.B.9.e.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.9.e.2 **Recordkeeping:**

Records of the notifications required by this condition shall be maintained consistent with the requirements of Provision S.1 in Section I of this permit.

II.B.9.e.3 **Reporting:**

In addition to the reporting requirements in Section I of this permit, the permittee shall provide the following notifications.
1. Notification of new equipment installation must be submitted to DAQ seven days prior to such installation. Relocation or removal of equipment which does not involve a modification (increase in emissions or installation of new air pollution control equipment) will not require prior notification. Notification shall include equipment size, type, location, estimated emissions, impact of estimated maintenance hours for new equipment and existing maintenance hours limit consumed.

2. Hill shall generate a list of all operating limited use power supply equipment (equipment list) that are subject to this condition within three working days upon request from a representative of the Executive Secretary. This equipment list shall contain each limited use power supply equipment¿s output capacity, manufacture type, fuel type, location and equipment identification numbers.

II.B.10 **Conditions on Metal Flame Spray Operations (Unit #12).**

II.B.10.a **Condition:**

Visible emission shall be no greater than 10 percent opacity from the impingement scrubber, each of the HVOF spray booths, and the plasma spray waterfall booth in Building 511. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0101210190-08].

II.B.10.a.1 **Monitoring:**

A visual opacity survey of each affected emission unit shall be performed on a monthly basis by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If visible emissions other than condensed water vapor are observed from an emission unit it will be shutdown. An opacity determination of that emission unit shall be performed by a certified observer on startup. The opacity determination shall be performed in accordance with 40 CFR 60, Appendix A, Method 9.

II.B.10.a.2 **Recordkeeping:**

The permittee shall record the date of each visual opacity survey and keep a list of the emission points checked during the visual opacity survey. The permittee shall also keep a log of the following information for each observed visual emission: date and time visual emissions observed, emission point location and description, time and date of opacity test, and percent opacity. The records required by this provision and all data required by 40 CFR 60, Appendix A, Method 9 shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.10.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.11 **Conditions on Metal Plating Subject to Hard Chrome NESHAP (Unit #13).**

II.B.11.a **Condition:**

The permittee shall prepare and implement an operation and maintenance (O & M) plan. The plan shall include the following elements:

(A) The plan shall specify the operation and maintenance criteria for the affected source, the add-on air pollution control device, and the process and control system monitoring equipment, and shall include a standardized checklist to document the operation and maintenance of this equipment;

(B) The plan shall incorporate the following work practice standards:

1. Once per quarter visually inspect the scrubber to ensure that there is proper drainage, no chromic acid buildup on the pads, and no evidence of chemical attack on the structural integrity of the device.
2. Once per quarter visually inspect the back portion of the mesh pad closest to the fan to ensure that it is dry and there is no breakthrough of chromic acid mist

3. Once per quarter visually inspect the ductwork from the tank to the scrubber to ensure that there are no leaks.

4. At the frequency specified by the manufacturer, perform washdown of the scrubber in accordance with manufacturers recommendations;

(C) The plan shall specify procedures to be followed to ensure that equipment or process malfunctions due to poor maintenance or other preventable conditions do not occur; and

(D) The plan shall include a systematic procedure for identifying malfunctions of process equipment, add-on air pollution control devices, and process and control system monitoring equipment and for implementing corrective actions to address such malfunctions.

To satisfy these applicable requirements, the permittee may use applicable standard operating procedure (SOP) manuals, Occupational Safety and Health Administration (OSHA) plans, or other existing plans, provided the alternative plans meet the requirements of this permit condition. If the operation and maintenance plan fails to address or inadequately addresses an event that meets the characteristics of a malfunction at the time the plan is initially developed, the permittee shall revise the operation and maintenance plan within 45 days after such an event occurs. The revised plan shall include procedures for operating and maintaining the process equipment, add-on air pollution control device, or monitoring equipment during similar malfunction events, and a program for corrective action for such events. [Authority granted under 40 CFR 63.342(f)(3)(i), (ii), and (vi) (Subpart N); condition originated in 40 CFR 63.342 (Subpart N)].

II.B.11.a.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.11.a.2 **Recordkeeping:**

The permittee shall maintain the following records for each affected source:

(1) Inspection records for the add-on air pollution control device and monitoring equipment, to document that the inspection and maintenance required by the work practice standards of this condition have taken place. The record can take the form of a checklist and should identify the device inspected, the date of inspection, a brief description of the working condition of the device during the inspection, and any actions taken to correct deficiencies found during the inspection.
(2) Records of all maintenance performed on the affected source, the add-on air pollution control device, and monitoring equipment;
(3) Records of the occurrence, duration, and cause (if known) of each malfunction of process, add-on air pollution control, and monitoring equipment;
(4) Records of actions taken during periods of malfunction when such actions are inconsistent with the operation and maintenance plan;
(5) Other records, which may take the form of checklists, necessary to demonstrate consistency with the provisions of the operation and maintenance plan required by this condition.
(6) The specific identification (i.e., the date and time of commencement and completion) of each period of excess emissions, as indicated by monitoring data, that occurs during malfunction of the process, add-on air pollution control, or monitoring equipment;
(7) The specific identification (i.e., the date and time of commencement and completion) of each period of excess emissions, as indicated by monitoring data, that occurs during periods other than malfunction of the process, add-on air pollution control, or monitoring equipment;
(8) The total process operating time of the affected source during the reporting period; and
(9) All documentation supporting the notifications and reports required by 40 CFR 63.9, 40 CFR 63.10, and 40 CFR 63.347.

The permittee shall keep the written operation and maintenance plan on record after it is developed to be made available for inspection, upon request, by the Executive Secretary for the life of the affected source or until the source is no longer subject to the provisions of this subpart. In addition, if the operation and maintenance plan is revised, the owner or operator shall keep previous (i.e., superseded) versions of the operation and maintenance plan on record to be made available for inspection, upon request, by the Executive Secretary for a period of 5 years after each revision to the plan.

II.B.11.a.3 **Reporting:**

In addition to the reporting required in Section I of this permit, if actions taken by the permittee during periods of malfunction are inconsistent with the procedures specified in the operation and maintenance plan required by this condition, the permittee shall record the actions taken for that event and shall report by phone such actions within 2 working days after commencing actions inconsistent with the plan. This report shall be followed by a letter within 7 working days after the end of the event, unless the permittee makes alternative reporting arrangements, in advance, with the Executive Secretary.

Also a summary report shall be submitted to document compliance status. This summary report shall be submitted semiannually unless a stack test shows that the emission limit has been exceeded, in which case the report shall be submitted quarterly until a request to reduce reporting frequency, submitted in accordance with 40 CFR 63.347(g)(2), is approved. The summary report must contain the following information:

(i) The company name and address of the affected source;

(ii) An identification of the operating parameter that is monitored for compliance determination, as required by this permit;

(iii) The relevant emission limitation for the affected source, and the operating parameter value, or range of values, that correspond to compliance with this emission limitation as specified in the notification of compliance status required by this permit;

(iv) The beginning and ending dates of the reporting period;

(v) A description of the type of process performed in the affected source;

(vi) The total operating time of the affected source during the reporting period;

(viii) A summary of operating parameter values, including the total duration of excess emissions during the reporting period as indicated by those values, the total duration of excess emissions expressed as a percent of the total source operating time during that reporting period, and a breakdown of the total duration of excess emissions during the reporting period into those that are due to process upsets, control equipment malfunctions, other known causes, and unknown causes;

(ix) A certification by a responsible official that the work practice standards in of this permit were followed in accordance with the operation and maintenance plan for the source;

(x) If the operation and maintenance plan required by this permit was not followed, an explanation of the reasons for not following the provisions, an assessment of whether any excess emission and/or parameter monitoring exceedances are believed to have occurred, and a copy of the report(s) required by this permit documenting that the operation and maintenance plan was not followed;

(xi) A description of any changes in monitoring, processes, or controls since the last reporting period;

(xii) The name, title, and signature of the responsible official who is certifying the accuracy of the report; and

(xiii) The date of the report. When more than one monitoring device is used to comply with the continuous compliance monitoring required by this permit, the permittee shall report the results as required for each monitoring device. However, when one monitoring device is used as a backup for the primary monitoring device, the permittee shall only report the results from the monitoring device used to meet the monitoring requirements of this subpart. If both devices are used to meet these requirements, then the permittee shall report the results from each monitoring device for the relevant compliance period. (origin: 40 CFR 63.347(g) Subpart N).

II.B.11.b **Condition:**

On and after the date on which the initial performance test is required to be completed except during automatic washdown cycles, scrubbers on the affected emission units shall be operated within plus or minus two inches of water column of the pressure drop value established during the initial performance test, or shall be operated within the range of compliant values for pressure drop established during multiple performance tests. [Authority granted under 40 CFR 63.343(c)(1)(ii) and (iv) Subpart N; condition originated in 40 CFR 63.342(c)(1) (Subpart N)].

II.B.11.b.1 **Monitoring:**

The permittee shall monitor and record the pressure drop across the composite mesh-pad system once each day that any affected source is operated. All monitoring equipment shall be installed such that representative measurements of process parameters are obtained. For monitoring equipment purchased from a vendor, verification of the operational status of the equipment shall include execution of the manufacturer written specifications or recommendations for installation, operation and calibration of the system. Specification for differential pressure measurement devices used to measure pressure drop across a control system shall be in accordance with manufacturer's accuracy specifications. Pressure taps shall be installed at any of the following locations:

(A) At the inlet and outlet of the control system. The inlet tap should be installed in the ductwork just prior to the control device and the corresponding outlet pressure tap should be installed on the outlet side of the control device prior to the blower or on the downstream side of the blower;

(B) On each side of each mesh pad within the control system; or

(C) On the front side of the first mesh pad and back side of the last mesh pad within the control system.

(ii) Pressure taps shall be sited at locations that are:

(A) Free from pluggage as possible and away from any flow disturbances such as cyclonic demisters.

(B) Situated such that no air infiltration at measurement site will occur that could bias the measurement.

(iii) Pressure taps shall be constructed of either polyethylene, polybutylene, or other nonreactive materials.

(iv) Nonreactive plastic tubing shall be used to connect the pressure taps to the device used to measure pressure drop.

(v) Any of the following pressure gauges can be used to monitor pressure drop: a magnehelic gauge, an inclined manometer, or a "U" tube manometer.

(vi) Prior to connecting any pressure lines to the pressure gauge(s), each gauge should be zeroed. No calibration of the pressure gauges is required.

II.B.11.b.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.11.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.11.c **Condition:**

At all times, including periods of startup, shutdown, and malfunction, the permittee shall operate and maintain the chrome plating lines, including associated air pollution control devices and monitoring equipment, in a manner consistent with good air pollution control practices and consistent with the operation and maintenance plan required by this permit, for the appropriate chrome plating lines. Malfunctions shall be corrected as soon as practicable after their occurrence accordance with the operation and maintenance plan. [Authority granted under 40 CFR 63.342(f)(1)(i) (Subpart N); condition originated in 40 CFR 63.342(f)(1) (Subpart N)].

II.B.11.c.1 **Monitoring:**

Determination of whether acceptable operation and maintenance procedures are being used will be based on information available, which may include, but is not limited to: monitoring results; review of the operation and maintenance plan, procedures, and records; and inspection of the affected emission unit

II.B.11.c.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.11.c.3 **Reporting:**

In addition to the reporting requirements of Section I of this permit, the permittee shall submit the notifications required by 40 CFR 63.345 and 40 CFR 63.347(c)(2) for new or reconstructed sources.

II.B.11.d **Condition:**

Emissions of Total Chromium shall be no greater than 0.015 mg/dscm (6.6 x 10E-6 grains/dscf) of ventilation air during tank operation and during periods of startup and shutdown. The emission limitation does not apply during periods of malfunction, but the work practice standards of this permit that address operation and maintenance shall be followed during malfunctions. [Authority granted under 40 CFR 63.342(b)(1) and (c)(1)(i) (Subpart N); condition originated in 40 CFR 63.342(c)(1)(i) (Subpart N)].

II.B.11.d.1 **Monitoring:**

Stack testing shall be performed as specified below:

(a) Testing and Frequency. The permittee shall conduct an initial performance test for new or reconstructed affected sources within 180 days of startup for such source. The permittee may also repeat the performance test and establish new site-specific operating parameters. (origin: 40 CFR 63.7(a)(2), 343(a)(2), 343(b)(1) and 343(c)(1)(iii))

(b) Notification. The permittee of shall notify the Executive Secretary in writing of his or her intention to conduct a performance test at least 60 calendar days before the test is scheduled to begin to allow the Executive Secretary to have an observer present during the test. A test plan as required in 40 CFR 63.7(c)(2) shall be prepared and submitted to the Executive Secretary at the time of notification. (40 CFR 63.7(b) and 347(d)(1))

(c) Sample Location. The emission sample point shall conform to the requirements of 40 CFR 60, Appendix A, Method 1 and 40 CFR 63.7(d). In addition, Occupational Safety and Health Administration (OSHA) approved access shall be provided to the test location.

(d) Method to be used. Method 306 or 306A, "Determination of Chromium Emissions From Decorative and Hard Chromium Electroplating and Anodizing Operations" (40 CFR 63, Appendix A, Method 306 and 306A). The sampling time and sample volume for each run of Methods 306 and 306A shall be at least 120 minutes and 60 dscf respectively. (origin: 40 CFR 63.344(c))

(e) Establishment of Site Specific Operating Parameters. During the initial performance test the permittee, shall establish as a site-specific operating parameter the pressure drop across the system, setting the value that corresponds to compliance with emission limit of this condition using pressure drop monitoring procedures specified for the affected emission unit in this permit. The permittee may conduct multiple performance tests to establish a range of compliant pressure drop values, or may set as the compliant value the average pressure drop measured over the three test runs of one performance test and accept ±2 inches of water column from this value as the compliant range.(origin: 40 CFR 63.343(c)(1)(i) and 344(d)(5))

(f) Performance tests shall be conducted under such conditions as the Executive Secretary specifies to the permittee based on representative performance (i.e., performance based on normal operating conditions) of the affected source. Operations during periods of startup, shutdown, and malfunction shall not constitute representative conditions for the purpose of a performance test, nor shall emissions in excess of the level of the relevant standard during periods of startup, shutdown, and malfunction be considered a violation of the relevant standard unless otherwise specified in the relevant standard or a determination of noncompliance is made under 40 CFR 63.6(e). Upon request, the permittee shall make available to the Executive Secretary such records as may be necessary to determine the conditions of performance tests. (origin: 40 CFR 63.7(e)(1))

II.B.11.d.2 **Recordkeeping:**

Results of all stack testing shall be documented in a test report containing at least the following information, as specified in 40 CFR 63.344(a) Subpart N:

1. Brief process description
2. Sampling location description
3. Description of testing procedures used
4. Test results
5. Quality assurance procedures and results
6. Records of operating conditions during the test, preparation of standards, and calibration procedures
7. Raw data sheets from field sampling and field and laboratory analyses
8. Documentation of calculations and,
9. Any other information required by the test method.

The test report and all measurements as may be necessary to determine the conditions of performance tests shall be kept in accordance with provision I.S.1 of this permit.

II.B.11.d.3 **Reporting:**

Reports of performance test results shall be submitted no later than 90 days following the completion of the performance test. A notification of compliance status (NOC) shall also be submitted for new or reconstructed sources pursuant to 40 CFR 63.347(e). The NOC shall be submitted no later than 90 calendar days following the completion of the compliance demonstration required by the condition and shall include the performance test results. There are no additional reporting requirements for this provision except those specified in Section I of this permit.

II.B.12 **Conditions on Metal Plating Not Subject to Hard Chrome NESHAP (Unit #15).**

II.B.12.a **Condition:**

The scrubbing liquor shall be either fresh water (tap, deionized or distilled water acceptable) or recirculating water with fresh water makeup. The maximum conductivity of the scrubbing liquid shall not exceed 1,000 micro-siemens/cm. The recirculation scrubbing water pH shall not be less than 2.5 or exceed 11.0. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121171-05].

II.B.12.a.1 **Monitoring:**

The scrubber water pH and conductivity shall be measured once per week by collecting a sample from each of the corresponding recirculating tanks.

II.B.12.a.2 **Recordkeeping:**

A log of the scrubber water testing shall be kept which shall include:

A. pH
B. Conductivity
C. Time and date of testing
D. Corrective action taken.

II.B.12.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.12.b **Condition:**

The hydrogen cyanide emissions from scrubber No. 6 shall not exceed 0.047 tons per rolling 12-month period. The cadmium emissions from scrubber No. 6 shall not exceed 0.00021 tons per rolling 12-month period. Based on a correlation established between cadmium emissions and the magnitude of electrical current applied during the cadmium plating process, and based on sampling results indicating that the cadmium emissions limit would be reached before the hydrogen cyanide limit (reference: report submitted by Hill AFB on April 12, 2000), compliance with a limitation of 2,460,000 amp-hours per rolling 12-month period at plating line 10 shall constitute compliance with the hydrogen cyanide and cadmium emission limits for scrubber No. 6. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121171-05].

II.B.12.b.1 **Monitoring:**

Records of amp-hours consumption for plating line 10 shall be maintained for all periods when the line is in operation. Compliance with the amp-hour limitations shall be based on a rolling 12-month total. By the end of each calendar month, a monthly rolling 12-month total shall be calculated using data from the previous 12 months.

II.B.12.b.2 **Recordkeeping:**

Records of amp-hour consumption shall be kept on site and made available to the Executive Secretary upon request. Results of monitoring shall be maintained as described in Provision I.S.1 of this permit.

II.B.12.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.12.c **Condition:**

Scrubbers shall be operated within plus or minus two inches of water of the provisional compliant pressure drop. A provisional compliant pressure drop range is based on operational experience. Provisional compliant pressure drop ranges shall be posted near the pressure drop monitor in a way that it is accessible to plant personnel as well as to the Executive Secretary or a representative. The compliant range for each scrubber must be included in the corresponding Operation and Maintenance Plan for each of these air pollution control devices. An excursion of more than two inches of water outside the compliant range will be allowed for a maximum of ten minutes. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121171-05].

II.B.12.c.1 **Monitoring:**

All scrubbers shall be equipped with a primary pressure drop monitoring system (pressure differential gauge) with set point alarms that are actuated if the pressure drop exceeds the provisional compliant pressure drop. This pressure drop monitoring system must be operated at all times that the plating line is operational. The permittee shall monitor and record the pressure drop across the composite mesh-pad system once each day that any affected source is operated. Any maintenance of the primary pressure drop monitoring system that cannot be performed within one (1) hour shall be scheduled for times when plating line is not in use unless a secondary pressure drop monitoring system (std. manometer) is installed. If a secondary system is used, an hourly log of manometer readings shall be maintained. A visual inspection of all the mesh pads used in scrubbers must be performed semi-annually.

II.B.12.c.2 **Recordkeeping:**

The permittee shall maintain records of daily pressure drop monitoring in accordance with provision I.S.1 of this permit. In addition, records of each non- routine (not regularly scheduled) alarm occurrence shall be kept in accordance with provision I.S.1 of this permit and shall include:

A. Date & time of day of alarm
B. Problems encountered
C. Corrective action required

Records of each mesh pad/packing material inspection shall be kept which shall include:

A. Date of inspection
B. Problems encountered
C. Corrective action taken, if any

Records of pressure drop monitoring and alarm occurrences shall be made available to the Executive Secretary or a representative upon request and shall include a period of five years ending with the date of the request.

II.B.12.c.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.13 **Conditions on Solvent Cleaning Machines (Unit #17).**

II.B.13.a **Condition:**

VOC emissions shall be no greater than 35 tons per 12-month rolling period. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121173-05].

II.B.13.a.1 **Monitoring:**

VOC emissions shall be recorded by the 30th day of each month (28th for February) using the consumption data from the previous 12 months. The permittee shall determine VOC emissions monthly from immersion cold cleaning equipment > 2 gallons, remote cold cleaning equipment, open-top vapor degreasing equipment, and degreasers subject to 40 CFR 63 Subpart T. The permittee shall determine VOC emissions from immersion cold cleaning equipment <= 2 gallons at least once per calendar year using records described in this condition. These emissions will be added to the 12 month rolling total VOC emission from immersion cold cleaning equipment > 2 gallons, remote cold cleaning equipment, open-top vapor degreasing equipment, and degreasers subject to 40 CFR 63 Subpart T to determine the rolling 12 month total VOC emissions from the affected emission unit.

II.B.13.a.2 **Recordkeeping:**

Records of material shall be kept on a daily basis for immersion cold cleaning equipment > 2 gallons, remote cold cleaning equipment, open-top vapor degreasing equipment, and degreasers subject to 40 CFR 63 Subpart T. Records of material shall be kept on an annual basis for immersion cold cleaning equipment <= 2 gallons.

1. Name of VOC-containing material
2. VOC content of material
3. MSDS for each material
4. Quantity of material
5. Monitoring records required above

Records of material may be based on purchase and/or issue records. These records may be kept in electronic form. Records of materials as applicable under the categories defined above shall be kept for all periods when respective operations are performed.

II.B.13.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.13.b **Condition:**

Flexibility Provisions - HAFB is allowed to add or modify any equipment not subject to 40 CFR 63 Subpart T, provided that each of the following conditions are met:

1. The proposed addition or modification does not cause an increase in the currently established base-wide allowable VOC emissions limit of 35.00 tons per rolling 12 month total.

2. The new or modified installation or piece of equipment must meet the corresponding approved BACT determination as provided in the subject approval order. If new BACT for this type of process is established, DAQ has the right to re-open the subject approval order to change BACT for this process accordingly. [Authority granted under R307- 401- 8(1) [BACT]; condition originated in DAQE-AN0121173-05].

II.B.13.b.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.13.b.2 **Recordkeeping:**

Records of the notifications required by this condition shall be maintained consistent with the requirements of Provision S.1 in Section I of this permit.

II.B.13.b.3 **Reporting:**

In addition to the reporting requirements in Section I of this permit, the permittee shall provide the following notifications.

1. Notification of new non-NESHAP (40 CFR 63 Subpart T) equipment installation (except immersion cold cleaning equipment <= 2 gallons) must be submitted to DAQ seven days prior to such installation. Relocation or removal of non-NESHAP (40 CFR 63 Subpart T) equipment which does not involve a modification (increase in emissions or installation of new air pollution control equipment) will not require prior notification. Notification shall include non-NESHAP (40 CFR 63 Subpart T) equipment size, type, location, conformity with BACT Standards, estimated emissions, impact of estimated emissions from equipment to the emissions limit in this permit.

2. A copy of any pertinent testing protocols, as required by the Pre-Approved BACT (i.e., initial compliance testing for new pollution control equipment) must be included with notice submittal. Where applicable, initial compliance testing must be performed within 180 days of the start up of the new emission source.

3. The permittee shall generate a list of all operating degreasingcleaning equipment (equipment list)(except for immersion cold cleaning equipment <= 2 gallons) that is subject to state and permit standards within three working days upon request from a representative of the Executive Secretary. This equipment list shall contain degreasingcleaning equipment type, conformity with BACT standards, location and equipment identification numbers.

II.B.14 **Conditions on Immersion Cold Cleaning Equipment > 2 Gallons (Unit #17a).**

II.B.14.a **Condition:**

Each affected emission unit shall meet state standards of R307-335-4 with the following requirements:

1. Waste or used solvent shall be stored in covered containers. Waste solvents or waste materials that contain solvents shall be disposed of by recycling, reclaiming, by incineration in an incinerator approved to process hazardous materials, or by an alternate means approved by the executive secretary.

2. Hill shall drain solvent cleaned parts for 15 seconds or until dripping has stopped, whichever is longer. Parts having cavities or blind holes shall be tipped or rotated while draining.

3. If the solvent volatility is greater than 4.3 kPa (33 mm Hg or 0.6 psi) measured at 38 degrees C (100 degrees F), or if solvent is heated above 50 degrees C (120 degrees F), then one of the following control devices shall be used:

(a) freeboard that gives a freeboard ratio greater than 0.7;
(b) water cover if the solvent is insoluble in and heavier than water);
(c) other systems of equivalent control, such as a refrigerated chiller or carbon absorption.

4. A cover shall be installed which shall remain closed except during actual loading, unloading or handling of parts in cleaner.

5. If used, the solvent spray shall be a solid fluid stream at a pressure which does not cause excessive splashing and may not be a fine, atomized or shower type spray. [Authority granted under R307- 401- 8(1) (BACT) & R307-335-4; condition originated in DAQE-AN0121173-05 & R307-335-4]

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II.B.14.a.1 **Monitoring:**

Visual inspection shall be made at least once per semi-annual period to determine compliance with this condition.

II.B.14.a.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.14.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.15 **Conditions on Remote Cold Cleaning Equipment (Unit #17c).**

II.B.15.a **Condition:**

Each affected emission unit shall meet state standards of R307-335-4 with the following requirements.

1. Waste or used solvent shall be stored in covered containers. Waste solvents or waste materials that contain solvents shall be disposed of by recycling, reclaiming, by incineration in an incinerator approved to process hazardous materials, or by an alternate means approved by the executive secretary.

2. Hill shall drain solvent cleaned parts for 15 seconds or until dripping has stopped, whichever is longer. Parts having cavities or blind holes shall be tipped or rotated while draining.

3. Hill's remote-reservoir batch cold solvent cleaning machines shall employ a tightly fitting cover over the solvent sump that shall be closed at all times except during the cleaning of parts.

4. Tanks, containers and all associated equipment shall be maintained in good operating condition and leaks shall be repaired immediately or the degreaser shall be shutdown.

5. If used, the solvent spray shall be a solid fluid stream at a pressure which does not cause excessive splashing and may not be a fine, atomized or shower type spray. [Authority granted under R307- 401- 8(1) (BACT) & R307-335-4; condition originated in DAQE-AN0121173-05 & R307-335-4].

II.B.15.a.1 **Monitoring:**

Visual inspection shall be made at least once per semi-annual period to determine compliance with this condition.

II.B.15.a.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.15.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.16 **Conditions on Open-Top Vapor Degreasing Equipment (Unit #17d).**

II.B.16.a **Condition:**

Each affected emission unit shall meet state standards of R307-335-5 with the following requirements.

(1) Equip the vapor degreaser with a cover that can be opened and closed without disturbing the vapor zone. The cover shall be closed except when processing workloads through the degreaser;

(2) Install one of the following control devices:
(a) Equipment necessary to sustain:
(i) a freeboard ratio greater than or equal to 0.75, and
(ii) a powered cover if the degreaser opening is greater than 1 square meter (10 square feet),
(b) Refrigerated chiller,
(c) Enclosed design (cover or door opens only when the dry part is actually entering or exiting the degreaser),
(d) Carbon adsorption system, with ventilation greater than or equal to 15 cubic meters per minute per square meter (50 cubic feet per minute per square foot) of air/vapor area when cover is open and exhausting less than 25 parts per million of solvent averaged over one complete adsorption cycle;

(3) Minimize solvent carryout by:
(a) Racking parts to allow complete drainage,
(b) Moving parts in and out of the degreaser at less than 3.3 meters per minute (11 feet per minute),
(c) Holding the parts in the vapor zone at least 30 seconds or until condensation ceases,
(d) Tipping out any pool of solvent on the cleaned parts before removal, and
(e) Allowing the parts to dry within the degreaser for at least 15 seconds or until visibly dry.

(4) Spray parts only in or below the vapor level,

(5) Not use ventilation fans near the degreaser opening, nor provide exhaust ventilation exceeding 20 cubic meters per minute per square meter (65 cubic feet per minute per square foot) in degreaser open area, unless necessary to meet State and Federal occupational, health, and safety requirements. The exhaust ventilation flow indicated above shall be measured using EPA Reference Methods 1 and 2 of 40 CFR Part 60, or by EPA-approved equivalent state methods;

(6) Not degrease porous or absorbent materials, such as cloth, leather, wood or rope;

(7) Not allow workloads to occupy more than half of the degreaser's open top area;

(8) Ensure that solvent is not visually detectable in water exiting the water separator;

(9) Install safety switches on the following:
(a) Condenser flow switch and thermostat (shuts off sump heat if condenser coolant is either not circulating or too warm); and
(b) Spray switch (shuts off spray pump if the vapor level drops excessively, i.e., greater than

10 cm (4 inches); and

(10) Ensure that the control device specified by (2)(b) or (d) above meet the applicable requirements of R307-340-4 and 15.

Open top vapor degreasers with an open area smaller than one square meter (10.9 square feet) are exempt from (2)(b) and (d) above. [Authority granted under R307- 401- 8(1) (BACT) & R307-335-5; condition originated in DAQE-AN0121173-05 & R307-335-5]
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II.B.16.a.1 **Monitoring:**

Visual inspection shall be made at least once per semi-annual period to determine compliance with this condition.

II.B.16.a.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.16.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.17 **Conditions on Cold Solvent Tanks, Building 2013 (Unit #18).**

II.B.17.a **Condition:**

The permittee shall operate the affected emission units in accordance with the following conditions:

(1) A cover shall be installed on each tank. The covers shall remain closed except during actual periods of operation of the tanks.
(2) An internal draining rack for cleaned parts shall be install in both tanks. The parts shall be drained until all dripping ceases
(3) Waste or used solvent shall be stored in covered containers and disposed of by a method which prevents its emission to the atmosphere.
(4) Tanks, containers, and all associated equipment shall be maintained in good operating condition and leaks shall be repaired immediately.
(5) Written procedures for the operation and maintenance of the solvent cleaning equipment shall be posted in an accessible and conspicuous location near the equipment.
(6) The cleaning solvent used shall be isopropyl alcohol. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-353-88].

II.B.17.a.1 **Monitoring:**

Visual inspection shall be made at least once per semi-annual period to determine compliance with items 1 through 5 of this condition. Compliance with item 6 of this condition shall be determined from records of invoices showing the solvent type purchased.

II.B.17.a.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.17.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.18 **Conditions on Curing and Burnout Ovens in Bldg. 843 (Unit #20).**

II.B.18.a **Condition:**

The permittee shall not exceed the following consumption limit:

A. 10.78 MMSCF/yr of natural gas consumed per rolling 12-month period for the curing and burnout ovens. [Authority granted under R307- 401-8(1) [BACT[; condition originated in DAQE-AN0101210186-08]

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II.B.18.a.1 **Monitoring:**

The amount of natural gas consumed in Building 843 shall be monitored on a monthly basis. By the 30th day of each calendar month (28th day for February, the rolling 12-month total shall be calculated based on the previous 12 months of data.

II.B.18.a.2 **Recordkeeping:**

Consumption or usage records shall be maintained for all periods of operation. These records can utilize purchase records and/or operation logs as a basis for consumption determinations. All records shall be maintained as described by Provision I.S.1 of this permit

II.B.18.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.18.b **Condition:**

Visible emissions from all ovens shall be no greater than 10 percent opacity. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0101210186-08].

II.B.18.b.1 **Monitoring:**

In lieu of monitoring via visible emission observations, fuel usage shall be monitored to demonstrate that only pipeline-quality natural gas is used as fuel.

II.B.18.b.2 **Recordkeeping:**

A copy of the required records shall be maintained in accordance with Provision I.S.1. of this permit and made available to the Executive Secretary upon request.

II.B.18.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.19 **Conditions on Baron Blakeslee Part Cleaner (Unit #21).**

II.B.19.a **Condition:**

(A) Batch Vapor and In-Line Cleaners

As an alternative to meeting the design, work practice and equipment specific requirements in 40 CFR 63.463, the permittee can elect to comply with the requirements specified in either paragraph (a)(1) or (a)(2) of 40 CFR 63.464 for each batch vapor or in-line solvent cleaning machine.

(1) If the cleaning machine has a solvent/air interface, as defined in 40 CFR 63.461, the permittee shall comply with the following requirements:

(i) Maintain a log of solvent additions and deletions for each solvent cleaning machine.
(ii) Ensure that the monthly emissions from each solvent cleaning machine are equal to or less than the applicable emission limit as presented below, in accordance with table 5 of 40 CFR 63, Subpart T:

Batch vapor solvent cleaning machines 150 kg/sq. meter/month
Existing in-line solvent cleaning machines 153 kg/sq. meter/month
New in-line solvent cleaning machines 99 kg/sq. meter/month

See 40 CFR 63.461 for definitions of new versus existing in-line solvent cleaning machines.
All emissions rates shall be based on a rolling 3-month average and determined using the procedures in 40 CFR 63.465(b) and (c).

(2) If the cleaning machine is a batch vapor cleaning machine and does not have a solvent/air interface, the permittee shall comply with the following requirements:

(i) Maintain a log of solvent additions and deletions for each solvent cleaning machine.
(ii) Ensure that the emissions from each solvent cleaning machine are equal to or less than the appropriate limits as described in (A) and (B) below:

(a) For cleaning machines with a cleaning capacity, as reported in 40 CFR 63.468(d), that is less than or equal to 2.95 cubic meters, the emission limit shall be determined using 40 CFR 63.464 Table 6 or equation 1:

$$EL = 330 * (Vol)\ 0.6$$

where:
EL = the rolling 3-month average monthly emission limit(kilograms/month).
Vol = the cleaning capacity of the solvent cleaning machine (cubic meters).

If using table 6, and the cleaning capacity of the cleaning machine falls between two cleaning capacity sizes, then the lower of the two emission limits applies.

(b) For cleaning machines with a cleaning capacity as reported in 40 CFR 63.468(d), that is greater than 2.95 cubic meters, the emission limit shall be determined using equation 1. [Authority granted under 40 CFR 63.464; condition originated in 40 CFR 63.463, Subpart T].

II.B.19.a.1 **Monitoring:**

On a monthly basis, the permittee shall use the procedures described in 40 CFR 63.465(b) and (c) to demonstrate compliance with the applicable 3-month rolling average monthly emission limit for each batch vapor or in-line solvent cleaning machine complying with the alternative standards of 40 CFR 63.464(a).

II.B.19.a.2 **Recordkeeping:**

(A) For each batch vapor or in-line solvent cleaning machine subject to the provisions of 40 CFR 63.464, the permittee shall maintain the following records in written or electronic form for a period of 5 years:

(1) The dates and amounts of solvent that are added to the solvent cleaning machine.
(2) The solvent composition of wastes removed from cleaning machines as determined using the procedure described in 40 CFR 63.465(c)(2).
(3) Calculation sheets showing how monthly emissions and the rolling 3-month average emissions from the solvent cleaning machine were determined, and the results of all calculations.

(B) For each solvent cleaning machine without a solvent/air interface complying with the provisions of 40 CFR 63.464, the permittee shall maintain records on the method used to determine the cleaning capacity of the cleaning machine.

II.B.19.a.3 **Reporting:**

(A) The permittee shall submit an initial statement of compliance to the Executive Secretary for each batch vapor or in-line solvent cleaning machine subject to the provisions of 40 CFR 63.464. The statement shall be submitted to the Executive Secretary no later than 150 days after startup and shall include the following information:

(1) The name and address of the solvent cleaning machine permittee.
(2) The address of the solvent cleaning machine(s).
(3) The solvent/air interface area for each solvent cleaning machine or, for cleaning machines without a solvent/air interface, a description of the method used to determine the cleaning capacity and the results.
(4) The results of the first rolling 3-month average emissions calculation.

(B) The permittee shall submit an annual solvent emission report to the Executive Secretary for each batch vapor or in-line solvent cleaning machine subject to the provisions of 40 CFR 63.464. This report shall be submitted by February 1 of the year following the one for which the reporting is being made and shall include the following requirements:

(1) The size and type of each unit subject to this subpart (solvent/air interface area or cleaning capacity).
(2) The average monthly solvent consumption for the solvent cleaning machine in kilograms per month.
(3) The rolling 3-month average solvent emission estimates calculated each month using the method as described in 40 CFR 63.465(c).
(4) The reports required under paragraphs (B) and (C) can be combined into a single report for the base.

(C) The permittee shall submit an exceedance report to the Executive Secretary semiannually except when, the Executive Secretary determines on a case-by-case basis that more frequent reporting is necessary to accurately assess the compliance status of the source or, an exceedance occurs. Once an exceedance has occurred the permittee shall follow a quarterly reporting format until a request to reduce reporting frequency under paragraph (D) is approved. Exceedance reports shall be delivered or postmarked by the 30th day following the end of each calendar half or quarter, as appropriate. The exceedance report shall include the following information, as applicable:

(1) Information on the actions taken to comply with 40 CFR 63.463(e) and (f). This information shall include records of written or verbal orders for replacement parts, a description of the repairs made, and additional monitoring conducted to demonstrate that monitored parameters have returned to accepted levels.

(2) If an exceedance has occurred, the reason for the exceedance and a description of the actions taken.

(3) If no exceedances of a parameter have occurred, or a piece of equipment has not been inoperative, out of control, repaired, or adjusted, such information shall be stated in the report.

(D) An permittee who is required to submit an exceedance report on a quarterly (or more frequent) basis may reduce the frequency of reporting to semiannual if the following conditions are met:

(1) The source has demonstrated a full year of compliance without an exceedance.

(2) The permittee continues to comply with all relevant recordkeeping and monitoring requirements specified subpart A (General Provisions) and in 40 CFR 63, Subpart T.

II.B.20 **Conditions on IC Engine/Turbine Test Stands (Unit #23).**

II.B.20.a **Condition:**

Visible emissions from JP-8 and diesel-fired engines shall be no greater than 20 percent opacity. [Authority granted under R307-401-8(1)(a) [BACT]; condition originated in DAQE- AN0101210186-08].

II.B.20.a.1 **Monitoring:**

Once per month when in operation, the permittee shall apply one of the following monitoring techniques to each JP-8 and diesel-fired affected emission unit:

A. A visual opacity survey conducted by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. The observer does not have to be a certified Method 9 observer. If any visible emissions other than condensed water vapor are observed from an emission point, an opacity determination of that emission point shall be performed by a certified VEO in accordance with 40 CFR 60, Appendix A, Method 9 within 24 hours of the initial visual opacity survey.

B. A photogrametric opacity determination shall be conducted by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. The observer does not have to be a certified Method 9 observer. If an opacity of 15 percent or more is detected by the photogrametric analysis, an opacity determination of that emission point shall be performed a certified VEO in accordance with 40 CFR 60, Appendix A, Method 9 within 24 hours of the initial photogrametric opacity determination.

Either of the above monitoring techniques may be applied to different affected emission units or to a given affected emission unit from month to month.

II.B.20.a.2 **Recordkeeping:**

The permittee shall maintain a log of visual opacity surveys and/or photogrametric observations which include the following information for each affected emission points checked: the date and time of each visual opacity survey or photogrametric observation, the specific monitoring technique used (opacity survey or photogrametric observation) and the result of the opacity monitoring. The records required by this provision and all data required by 40 CFR 60, Appendix A, Method 9 shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.20.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.20.b **Condition:**

For each gasoline-fired engine affected emission unit, the permittee shall not allow, cause or permit visible emissions. [Authority granted under R307-201-3(4); condition originated in R307-201-3(4)].

II.B.20.b.1 **Monitoring:**

The permittee shall apply one of the following monitoring techniques to each gasoline-fired affected emission unit when in operation:

(1) Monthly visual opacity survey conducted by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If any visible emissions other than condensed water vapor are observed from an emission point, an opacity determination of that emission point shall be performed in accordance with 40 CFR 52.128, Appendix A, Method 203C within 24 hours of the initial visual opacity survey or upon startup if the unit must be shutdown for maintenance. If the unit must be permanently removed from service, no follow-up opacity determination is required.

(2) Quarterly photogrametric opacity observations conducted by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If an opacity is detected by the photogrametric analysis, an opacity determination of that emission point shall be performed in accordance with 40 CFR 52.128, Appendix A, Method 203C within 24 hours of the initial photogrametric opacity observation or upon startup if the unit must be shutdown for maintenance. If the unit must be permanently removed from service, no follow-up opacity determination is required.

(3) An annual opacity determination performed in accordance with 40 CFR 52.128, Appendix A, Method 203C.

The monitoring option selected can vary from unit to unit. For example, if quarterly photogrametric opacity observations are being conducted for a given unit and the permittee cannot conduct a photogrametric opacity observation in a quarter that unit operated, an opacity determination conducted in accordance with the procedures of 40 CFR 52.128, Appendix A, Method 203C will satisfy the monitoring requirements of this condition.

II.B.20.b.2 **Recordkeeping:**

The permittee shall maintain a log of monthly visual opacity surveys, quarterly photogrametric observations, and/or annual opacity determinations which includes the following information for each affected emission unit: the date and time of each visual opacity survey, photogrametric opacity observation, annual opacity determination, the specific monitoring technique used (visual opacity survey, 40 CFR 52.128, Appendix A, Method 203C, or photogrametric observation) and the result of the opacity monitoring. The records required by this provision and all data required by 40 CFR 52.128, Appendix A, Method 203C shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.20.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.20.c **Condition:**

Combined JP-8 and diesel fuel consumed shall be no greater than 40,000 gallons per rolling 12 month period. [Authority granted under R307-401-8(1)(a) [BACT]; condition originated in DAQE-AN0101210186-08].

II.B.20.c.1 **Monitoring:**

Combined JP-8, and diesel fuel consumption shall be determined by fuel transfer orders and inventory records. By the 30th day of each calendar month (28th day for February), a new rolling 12-month total shall be calculated using data from the previous 12 months.

II.B.20.c.2 **Recordkeeping:**

Records of fuel consumption shall be kept on a monthly basis for each affected emission unit. Results of monitoring shall be maintained as described in Provision I.S.1 of this permit.

II.B.20.c.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.20.d **Condition:**

Gasoline fuel consumed shall be no greater than 5,400 gallons per rolling 12 month period. [Authority granted under R307-401-8(1)(a) [BACT]; condition originated in DAQE-AN0101210186-08].

II.B.20.d.1 **Monitoring:**

Gasoline fuel consumption shall be determined by fuel transfer orders and inventory records. By the 30th day of each calendar month (28th day for February), a new rolling 12-month total shall be calculated using data from the previous 12 months.

II.B.20.d.2 **Recordkeeping:**

Records of fuel consumption shall be kept on a monthly basis for each affected emission unit. Results of monitoring shall be maintained as described in Provision I.S.1 of this permit.

II.B.20.d.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.21 **Conditions on Aircraft Fuel/Oil Purge System (Unit #24).**

II.B.21.a **Condition:**

Extraction of JP-5 and/or JP-8 shall be no greater than 120,000 gallons per rolling 12-month period. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121172-05].

II.B.21.a.1 **Monitoring:**

By the 30th day (28th day for February) of each month, a rolling 12-month total shall be determined using records from the previous 12 months.

II.B.21.a.2 **Recordkeeping:**

Records of all extracted fuel shall be kept for all periods when the purge system is operational. Extractions shall be recorded on a log of the JP-5 and JP-8 extracted. All records shall be maintained as described by Provision I.S.1 of this permit.

II.B.21.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.22 **Conditions on Carbon Brake Facility (Unit #25).**

II.B.22.a **Condition:**

Visible emissions shall be no greater than 10 percent opacity. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121160-04].

II.B.22.a.1 **Monitoring:**

A visual opacity survey of each affected emission unit shall be performed on a monthly basis by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If visible emissions other than steam are observed from an emission unit, an opacity determination of that emission unit shall be performed by a certified observer within 24 hours of the initial survey. The opacity determination shall be performed in accordance with 40 CFR 60, Appendix A, Method 9.

II.B.22.a.2 **Recordkeeping:**

The permittee shall record the date of each visual opacity survey and keep a list of the emission points checked during the visual opacity survey. The permittee shall maintain all the records required by this provision and all data required by 40 CFR 60, Appendix A, Method 9 in accordance with Provision I.S.1 of this permit.

II.B.22.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.22.b **Condition:**

The permittee shall not consume more than 80 gallons of P-13 (in the process tank) per rolling 12-month period. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121160-04].

II.B.22.b.1 **Monitoring:**

Records of consumption shall be kept on a daily basis when in operation. By the 30th of each month (or the 28th for February), the permittee shall calculate a new rolling 12-month total using data from the previous 12 months.

II.B.22.b.2 **Recordkeeping:**

Daily consumption or usage records shall be maintained for all periods of operation. These records can utilize purchase records, operation logs, and/or inventory records as a basis for consumption determinations. Records shall be maintained as described by Provision I.S.1 of this permit.

II.B.22.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.23 **Conditions on Surface Coating Operation Group (Unit #26).**

II.B.23.a **Condition:**

VOC emissions shall not exceed 201.2 tons per rolling 12-month period from painting equipment or operations, solvent uses associated with paint booths, and chemical depainting operations that fall into categories A, B, C, D, E, F and G at HAFB main base and Little Mountain sites.

A Cleaning Operations Subject to NESHAP GG

B Primer and Topcoat Application Operations Subject to NESHAP GG

C Depainting (Chemical) Operations Subject to NESHAP GG

D Specialty Coating Application Operations to Aerospace Vehicles or Components

E Surface Coating Application Operations not Subject to NESHAP GG

F Specialty Coating Application Operations to non-Aerospace Vehicles or Components

G Depainting (Chemical) operations not Subject to NESHAP GG. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121168-04]
.

II.B.23.a.1 **Monitoring:**

By the 30th of each month (or the 28th for February), a rolling 12-month VOC total shall be calculated using data from the previous 12 calendar months.

II.B.23.a.2 **Recordkeeping:**

Records of material shall be kept on a daily basis for equipment and operations under categories A, B, C, D, E. F and G except for equipment and operations exempted out of paint booths/bays in condition II.B.24.d which shall be kept annually (except for exemption II.B.24.d(6) which is daily).

1. Name of VOC-containing material
2. VOC content of material
3. MSDS for each material
4. Quantity of material used
5. Monitoring records required above

Records of material usage may be based on purchase and/or issue records. Records of consumption of the materials as applicable under the categories defined above shall be kept for all periods when respective operations are performed. These records may be kept in electronic form and shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.23.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.23.b **Condition:**

Flexibility Provisions - HAFB will be allowed to add or modify any paint booth, Chemical striping operations, and/or any other piece of equipment associated with painting or Chemical striping at the main base or Little Mountain, provided that each of the following conditions is met:

1. The proposed addition or modification does not cause an increase in the currently established base-wide (including Little Mountain) allowable VOC emissions limit of 201.2 tons per rolling 12 month total.

2. The new or modified installation or piece of equipment must meet the corresponding Pre-Approved BACT determination as discussed in Appendix 1 of the cited approval order. If new BACT for this type of process is established, DAQ has the right to re-open this permit to change BACT for this process accordingly. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121168-04].

II.B.23.b.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.23.b.2 **Recordkeeping:**

Records of the notifications required by this condition shall be maintained consistent with the requirements of Provision S.1 in Section I of this permit.

II.B.23.b.3 **Reporting:**

In addition to the reporting requirements in Section I of this permit, the permittee shall provide the following notifications.

1. Notification (notify and go) of installations of new equipment must be submitted to DAQ seven days prior to the installation of the new equipment. Relocation or removal of equipment which does not involve a modification (increase in emissions or installation of new air pollution control equipment) will not require prior notification. Notification shall include equipment size, type, location, whether it is applicable to federal standards, conformity with BACT Standards, estimated emissions, impact of estimated emissions from equipment to the emissions limit in this permit.

2. A copy of any pertinent testing protocols, as required by the Pre-Approved BACT (i.e., initial compliance testing for new pollution control equipment) must be included with the notification submittal. Where applicable, initial compliance testing must be performed within 180 days of the start up of the new emission source.

3. An analysis of the applicability of offset requirements (offset analysis) and current actual emissions for the painting and chemical depainting operations must be included with each ¿notify and go¿ submission. The analysis shall take into account actual emissions from the painting and chemical depainting operation and proposed actual emission increase due to the addition of the new equipment.

4. Hill shall generate a list (equipment list) of all operating painting/depainting equipment that is subject to state and federal rules within three working day upon request from a representative of the executive secretary. This equipment list shall contain painting and depainting equipment type, NESHAP¿s applicability, location and AQUIS ID¿s.

II.B.23.c **Condition:**

For all applications of surface coatings to miscellaneous metal parts not subject to 40 CFR 63, Subpart GG, the permittee shall implement control techniques and work practices at all times to minimize fugitive VOC emissions. Control techniques and work practices include:

(a) tight fitting covers for tanks containing VOC containing materials;
(b) covered containers for solvent wiping cloths;
(c) collection hoods for areas where solvent is used for cleanup; and
(d) proper disposal of dirty cleanup solvent.

The permittee shall install, operate, and maintain process or control equipment, or both, monitoring instruments or procedures, as necessary, to minimize fugitive VOC emissions

Waste materials which contain solvents shall be disposed of by recycling, reclaiming or by incineration in an incinerator approved to process hazardous materials, disposal in a licensed hazwaste TSDF, or by an alternate means approved by the Executive Secretary. [Authority granted under R307-340-4; condition originated in DAQE-AN0121168-04].

II.B.23.c.1 **Monitoring:**

A visual inspection of each operation (building or weapon system) shall be made monthly for proper control techniques and work practices to ensure: minimization of fugitive VOC emissions, equipment is in good operating condition, and the proper disposal of waste solvents.

II.B.23.c.2 **Recordkeeping:**

The permittee shall record the date, operation, and results of each inspection required under this provision. The records shall be maintained in accordance with provisions of Section I.S.1 of this permit.

II.B.23.c.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.23.d **Condition:**

All painting equipment and operations under the affected emission unit must be applied inside a paint booth except for the following operations:

1. Painting performed using non-spray application methods

2 Painting with hand-held spray cans (aerosol paints)

3. Touch-up painting (defined as incidental painting to cover minor imperfections in the coating finish or to achieve complete coverage. This definition includes out-of-cycle and out of sequence painting.)

4. Stenciling

5. Incidental painting as required for assembly or joining of dissimilar metal components as long as paint is applied by either aerosol spray or a non-spray method.

6. Painting of items deemed by the Executive Secretary as not technically feasible to be moved inside a paint booth. This specifically includes museum aerospace displays, established touch-up operations, and assorted painting operations at Little Mountain to support Little Mountain Test operations. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121168-04].

II.B.23.d.1 **Monitoring:**

On a semi-annual basis, the permittee shall review operations to verify compliance with this condition.

II.B.23.d.2 **Recordkeeping:**

The permittee shall maintain operation exemption notes. These note and results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.23.d.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.23.e **Condition:**

All non-NESHAP paint booths shall be equipped with a waterfall or a set of paint arrestor particulate filters to control particulate emissions. All air exiting the booth shall pass through a control system before venting to the atmosphere (outside building/operation). [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121168-04].

II.B.23.e.1 **Monitoring:**

Visual inspections of all paint booth filters and waterfalls shall be conducted weekly by designated personnel to determine compliance with this condition, specifically inspectors should check for:

A) Proper installation of filter pads.
B) Good condition of Filter pads , or, if applicable,
C) Proper water flow through water waterfall.

II.B.23.e.2 **Recordkeeping:**

A log shall be kept on the results of visual inspections of the paint booth filters The log and results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.23.e.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.24 **Conditions on Aerospace NESHAP General (Unit #27).**

II.B.24.a **Condition:**

Except as provided in 40 CFR 63.743(a)(10) and Table 1 of 40 CFR 63 subpart GG, the permittee shall comply with the applicable requirements of:

40 CFR 63.4 Prohibited activities and circumvention;
40 CFR 63.5 Construction and reconstruction; and,
40 CFR 63.6 Compliance with standards and maintenance requirements. [Authority granted under 40 CFR 63.743(a); condition originated in DAQE-AN0121168-04].

II.B.24.a.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.24.a.2 **Recordkeeping:**

The permittee shall fulfill the recordkeeping requirements contained in 40 CFR 63.10(a), (b), (d), and (f).

II.B.24.a.3 **Reporting:**

The permittee shall fulfill the notification requirements contained in 40 CFR 63.9(a) through (e) and (h) through (j), and the reporting requirements of the General Provisions, 40 CFR part 63, subpart A, except as provided in 40 CFR 63.753 paragraphs (a)(2) and (a)(3).

II.B.24.b **Condition:**

For each air pollution control device or equipment used to control HAP emissions, the permittee shall prepare a, startup, shutdown, and malfunction plan that describes, in detail, procedures for operating and maintaining the source during periods of startup, shutdown, and malfunction and a program of corrective action for malfunctioning process and air pollution control equipment used to comply with the relevant standard, in accordance with 40 CFR 63.6. The permittee shall operate the control device or equipment in accordance with the plan. Dry particulate filter systems operated per manufacturers instructions are exempt from the startup, shutdown, and malfunction plan. A startup, shutdown, and malfunction plan shall be prepared for facilities using locally prepared operating procedures.

In addition to the information required in 40 CFR 63.6, this plan shall also include the following provisions :

(1) The plan shall specify the operation and maintenance criteria for each air pollution control device or equipment and shall include a standardized checklist to document the operation and maintenance of the equipment;
(2) The plan shall include a systematic procedure for identifying malfunctions and for reporting them immediately to supervisory personnel; and
(3) The plan shall specify procedures to be followed to ensure that equipment or process malfunctions due to poor maintenance or other preventable conditions do not occur. [Authority granted under 40 CFR 63.743(b); condition originated in DAQE-AN0121168-04].

II.B.24.b.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.24.b.2 **Recordkeeping:**

The permittee shall document activities performed to assure proper operation and maintenance. In addition, actions taken during startup, shutdown or malfunction, including actions to correct a malfunction shall be documented. Documentation shall include records of the occurrence and duration of each startup, shutdown or malfunction of the air pollution control equipment. Records shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.24.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.24.c **Condition:**

If the permittee wishes to use an air pollution control device or equipment not listed in 40 CFR 63 Subpart GG, they shall submit for approval by the Executive Secretary, a description of the device or equipment, test data verifying the performance of the device or equipment in controlling organic HAP and/or VOC emissions, as appropriate, and specific operating parameters that will be monitored to establish compliance with the standards not later than 120 days prior to the compliance date. [Authority granted under 40 CFR 63.743; condition originated in DAQE-AN0121168-04].

II.B.24.c.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.24.c.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.24.c.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.24.d **Condition:**

(1) When applied to parts and components subject to 40 CFR 63, Subpart GG, the following specialty coatings, including any VOC-containing materials added to the original coating supplied by the manufacturer, shall contain VOCs not exceeding the following limits:

Coating Type	VOC Content (g/L)
Ablative Coating	600
Adhesion Promoter	890
Adhesive Bonding Primer Cured at 250 F or below	850
Adhesive Bonding Primer Cured above 250 F	1030
Commercial Interior Adhesive	760
Cyanoacrylate Adhesive	1020
Fuel Tank Adhesive	620
Nonstructural Adhesive	360
Rocket Motor Bonding Adhesive	890
Rubber-based Adhesive	850
Structural Autoclaveable Adhesive	60
Structural Nonautoclaveable Adhesive	850
Antichafe Coating	660
Bearing Coating	620
Caulking and Smoothing Compounds	850
Chemical Agent-Resistant Coating	550
Clear Coating	720
Commercial Exterior Aerodynamic Structure Primer	650
Compatible Substrate Primer	780
Corrosion Prevention Compound	710
Cryogenic Flexible Primer	645
Cryoprotective Coating	600
Electric or Radiation -Effect Coating	800
Electrostatic Discharge and Electromagnetic Interference (EMI) Coating	800
Elevated temperature Skydrol Resistant Commercial Primer	740
Epoxy Polyamide Topcoat	660
Fire-Resistant (interior Coating)	800
Flexible Primer	640
Flight Test Coatings - Missile or Single Use Aircraft	420
Flight Test Coatings - All Other	840
Fuel-Tank Coating	720
High-Temperature Coating	850
Insulation Covering	740
Intermediate Release Coating	750
Lacquer	830
Bonding Maskant	1230
Critical Use and Line Sealer Maskant	1020
Seal Coat Maskant	1230

Metallized Epoxy Coating	740
Mold Release	780
Optical Anti-Reflective Coating	750
Parts Marking Coating	850
Pretreatment Coating	780
Rain erosion-Resistant Coating	850
Rocket Motor Nozzle Coating	660
Scale Inhibitor	880
Screen Print Ink	840
Extrudable/Rollable/Brushable Sealant	240
Sprayable Sealant	600
Self-priming Topcoat	420
Silicone Insulation Material	850
Solid Film Lubricant	880
Specialized Function Coating	890
Temporary Protective Coating	320
Thermal Control Coating	800
Wet Fastener Installation Coating	675
Wing Coating	850

(2) The permittee may comply with the VOC content provisions of paragraph (1) by using approved air pollution control equipment provided that the control system has combined VOC emissions capture and control equipment efficiency of at least 81 percent by weight

(3) The VOC content provisions of paragraph (1) do not apply to:

(a) manufacturing or rework operations involving space vehicles,

(b) rework operations performed on antique aerospace vehicles or components, or

(c) the following activities where cleaning and coating of aerospace components and vehicles may take place:

(i) research and development

(ii) quality control

(iii) laboratory testing

(iv) electronic parts and assemblies (except for cleaning and coating of completed assemblies

(4) The following coating applications are exempt from the VOC content limits of paragraph (1):

(a) Touch up, aerosol and DOD classified coatings,

(b) Coatings used on space vehicles,

(c) Facilities that use separate formulations in volume of less than 50 gallons per year, subject to a maximum exemption of 200 gallons for all formulations applied annually.

Specialty coatings are exempted from the application equipment requirements specified in the Aerospace NESHAP (40 CFR 63, Subpart GG)

The aerospace NESHAP does not contain control requirements for specialty coatings, adhesives, adhesive bonding primers, or sealants at aerospace facilities (40 CFR 63.741(f)).[Authority granted under R307-325 (RACT); condition originated in DAQE-AN0121168-04].

II.B.24.d.1 **Monitoring:**

(1) When complying with VOC content limits specified in Paragraph (1) through the use of compliant specialty coatings, records required for this permit condition will serve as monitoring.

(2) When complying with VOC content limits specified in Paragraph (1) through the use of an approved air pollution control equipment, the permittee shall submit a monitoring plan that specifies the applicable operating parameter value, or range of values, to ensure ongoing compliance with the VOC content limits. The monitoring device shall be installed, calibrated, operated, and maintained in accordance with the manufacturer's specifications.

II.B.24.d.2 **Recordkeeping:**

(1) For each coating operation using specialty coatings listed in paragraph (a)(1)(i), the permittee shall:

(a) Maintain a current list of coatings in use with category and VOC content as applied.

(b) Record coating usage on an annual basis using purchase and/or issue records.

(2) For each coating operation using a control equipment under paragraph (a)(1)(ii) shall record monitoring parameters as specified in the monitoring plan required.

II.B.24.d.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.25 **Conditions on Aerospace NESHAP Chemical Cleaning (Unit #28).**

II.B.25.a **Condition:**

For hand-wipe cleaning of aerospace vehicles or components subject to this condition (excluding cleaning of spray gun equipment performed in accordance with 40 CFR63.744 (c)), the permittee shall use cleaning solvents that meet one of the following requirements, as specified in paragraphs (b)(1), (b)(2), and (b)(3) of 40 CFR 63.744(b):

(1) Meet one of the following composition requirements:

(a) For aqueous solvents - Cleaning solvents in which water is the primary ingredient (no less than80 percent of the solvent solution, as applied must be water). Detergents, surfactants, and bioenzime mixtures and nutrients may be combined with the water along with a variety of additives, such as organic solvents (e.g. high boiling point alcohols), builders, saponifiers, inhibitors, emulsifiers, pH buffers, and antifoaming agents. Aqueous solutions must have a flash point greater than 93 deg C (200 deg F) (as reported by the manufacturer) and the solution must be miscible with water.

(b) For hydrocarbon-based solvents - Cleaners that are composed of photochemically reactive hydrocarbons and/ oxygenated hydrocarbons and have a maximum vapor pressure of 7 mm Hg at 20 deg C (3.75 in. H_2O and 68 deg F). These cleaners also contain no HAP.

(2) Have a composite vapor pressure of 45 mm Hg (24.1 in. H_2O) or less at 20 deg C (68 deg F); or

(3) Demonstrate that the volume of hand-wipe solvents used in cleaning operations has been reduced by at least 60% from a baseline adjusted for production. The baseline shall be established as part of an approved alternative plan administered by the Executive Secretary.

(4) The following cleaning operations are exempt from the hand-wipe cleaning requirements of 40 CFR 63.744:

(a) Cleaning during the manufacture, assembly, installation, maintenance, or testing of components of breathing oxygen systems that are exposed to the breathing oxygen;
(b) Cleaning during the manufacture, assembly, installation, maintenance, or testing of parts, subassemblies, or assemblies that are exposed to strong oxidizers or reducers (e.g., nitrogen tetroxide, liquid oxygen, or hydrazine);
(c) Cleaning and surface activation prior to adhesive bonding;
(d) Cleaning of electronic parts and assemblies containing electronic parts;
(e) Cleaning of aircraft and ground support equipment fluid systems that are exposed to the fluid, including air-to-air heat exchangers and hydraulic fluid systems;
(f) Cleaning of fuel cells, fuel tanks, and confined spaces;
(g) Surface cleaning of solar cells, coated optics, and thermal control surfaces;
(h) Cleaning during fabrication, assembly, installation, and maintenance of upholstery, curtains, carpet, and other textile materials used in the interior of the aircraft;
(i) Cleaning of metallic and non-metallic materials used in honeycomb cores during the manufacture or maintenance of these cores, and cleaning of the completed cores used in the manufacture of aerospace vehicles or components;
(k) Cleaning of aircraft transparencies, polycarbonate, or glass substrates;
(l) Cleaning and cleaning solvent usage associated with research and development, quality control, and laboratory testing;
(m) Cleaning operations, using nonflammable liquids, conducted within five feet of energized electrical systems. Energized electrical systems means any AC or DC electrical circuit on an assembled aircraft once electrical power is connected, including interior passenger and cargo areas, wheel wells and tail sections; and,
(n) Cleaning operations identified as essential uses under the Montreal Protocol for which the executive secretary has allocated essential use allowances or exemptions in 40 CFR 82.4. [Authority granted under 40 CFR 63.744 (b); condition originated in DAQE-AN0121168-04].

II.B.25.a.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.25.a.2 **Recordkeeping:**

The permittee shall fulfill all recordkeeping requirements specified in 40 CFR 63.10 (a), (b), (d), and (f). In addition, for each new or existing cleaning operation subject to 40 CFR 63, subpart GG the permittee shall record the following information, as appropriate, in accordance with paragraphs (b)(1) through (b)(4) of 40 CFR 63.752 (b):

(1) The name, vapor pressure, and documentation showing the organic HAP constituents of each cleaning solvent used for affected cleaning operations at the facility.

(2) For each cleaning solvent used in hand-wipe cleaning operations that complies with the composition requirements specified in 40 CFR63.744(b)(1) or for semi-aqueous cleaning solvents used for flush cleaning operations:
(i) The name of each cleaning solvent used;
(ii) All data and calculations that demonstrate that the cleaning solvent complies with one of the composition requirements; and

(iii) Annual records of the volume of each solvent used, as determined from facility purchase records or usage records.

(3) For each cleaning solvent used in hand-wipe cleaning operations that does not comply with the composition requirements in 40 CFR63.744(b)(1), but does comply with the vapor pressure requirement in 40 CFR63.744(b)(2):

(i) The name of each cleaning solvent used;

(ii) The composite vapor pressure of each cleaning solvent used;

(iii) All vapor pressure test results, if appropriate, data, and calculations used to determine the composite vapor pressure of each cleaning solvent; and

(iv) The amount (in gallons) of each cleaning solvent used each month at each operation.

(4) For each cleaning solvent used for the exempt hand-wipe cleaning operations specified in 40 CFR63.744(e) that does not conform to the vapor pressure or composition requirements of 40 CFR63.744(b):

(i) The identity and amount (in gallons) of each cleaning solvent used each month at each operation; and

(ii) A list of the processes set forth in 40 CFR63.744(e) to which the cleaning operation applies.

II.B.25.a.3 **Reporting:**

The permittee shall submit a semiannual reports occurring every 6 months from the date of the notification of compliance status that identify:

(1) Any instance where a noncompliant cleaning solvent is used for a non-exempt hand-wipe cleaning operation;

(2) A list of any new cleaning solvents used for hand-wipe cleaning in the previous 6 months and, as appropriate, their composite vapor pressure or notification that they comply with the composition requirements specified in 40 CFR 63.744(b)(1);

(3) If the hand-wipe cleaning operations have been in compliance for the semiannual period, a statement that the cleaning operations have been in compliance with the applicable standards. The semiannual report shall also include a statement of compliance signed by a responsible company official certifying that the facility is in compliance with all applicable requirements.

Semiannual compliance reports for each type of operation subject to Subpart GG (i.e. cleaning, primer and topcoat application, depainting, chemical milling maskant application) can be combined into a single semiannual compliance report.

II.B.25.b **Condition:**

The permittee shall use one or more of the following techniques, or their equivalent, as specified in 40 CFR 63.744 (c) paragraphs (c)(1) through (c)(4) for all spray gun cleaning operations subject to this condition in which spray guns are used for the application of coatings or any other materials that require the spray guns to be cleaned:

(1) (i) Enclosed system. Clean the spray gun in an enclosed system that is closed at all times except when inserting or removing the spray gun. Cleaning shall consist of forcing solvent through the gun.

(ii) If leaks are found during the monthly inspection required in 40 CFR 63.751(a), repairs shall be made as soon as practicable, but no later than 15 days after the leak was found. If the leak is not

repaired by the 15th day after detection, the cleaning solvent shall be removed, and the enclosed cleaner shall be shut down until the leak is repaired or its use is permanently discontinued.

(2) Nonatomized cleaning. Clean the spray gun by placing cleaning solvent in the pressure pot and forcing it through the gun with the atomizing cap in place. No atomizing air is to be used. Direct the cleaning solvent from the spray gun into a vat, drum, or other waste container that is closed when not in use.

(3) Disassembled spray gun cleaning. Disassemble the spray gun and clean the components by hand in a vat, which shall remain closed at all times except when in use. Alternatively, soak the components in a vat, which shall remain closed during the soaking period and when not inserting or removing components.

(4) Atomizing cleaning. Clean the spray gun by forcing the cleaning solvent through the gun and direct the resulting atomized spray into a waste container that is fitted with a device designed to capture the atomized cleaning solvent emissions.

(5) Cleaning of the nozzle tips of automated spray equipment systems, except for robotic systems that can be programmed to spray into a closed container, shall be exempt from these requirements. [Authority granted under 40 CFR 63.744(e); condition originated in DAQE-AN0121168-04].

II.B.25.b.1 **Monitoring:**

The permittee shall visually inspect the seals and all other potential sources of leaks associated with each enclosed gun spray cleaner system subject to 40 CFR 63.744(c)(1), at least once per month. Each inspection shall occur while the system is in operation. All detected leaks shall be repaired within 15 days after detection. If the leak is not repaired by the 15th day after detection, the solvent shall be removed and the enclosed cleaner shall be shut down until the cleaner is repaired or its use is permanently discontinued.

II.B.25.b.2 **Recordkeeping:**

The permittee shall fulfill all recordkeeping requirements specified in 40 CFR 63.10 (a), (b), (d), and (f). In addition, for each new or existing cleaning operation subject to 40 CFR 63, subpart GG the permittee shall record the following information as specified in paragraph (b)(5) of 40 CFR 63.752 (b):

A record of all leaks from enclosed spray gun cleaners identified pursuant to 40 CFR 63.751(a) that includes for each leak found:

(i) Source identification;
(ii) Date leak was discovered; and
(iii) Date leak was repaired.

II.B.25.b.3 **Reporting:**

The permittee shall submit semiannual reports occurring every 6 months from the date of the notification of compliance status that identify:

(1) Any instance where a noncompliant spray gun cleaning method is used;

(2) Any instance where a leaking enclosed spray gun cleaner remains unrepaired and in use for more than 15 days; and

(3) If the spray gun cleaning operations have been in compliance for the semiannual period, a statement that the cleaning operations have been in compliance with the applicable standards. The semiannual report shall also include a statement of compliance signed by a responsible company official certifying that the facility is in compliance with all applicable requirements.

Semiannual compliance reports for each type of operation subject to Subpart GG (i.e. cleaning, primer and topcoat application, depainting, chemical milling maskant application) can be combined into a single semiannual compliance report.

II.B.25.c **Condition:**

For operations subject to this condition, each time aerospace parts or assemblies, or components of a coating unit (with the exception of spray guns) are flush cleaned, the permittee shall empty the used cleaning solvent into either:

1. an enclosed container, or
2. a collection system that is kept closed when not in use, or
3. into a system with equivalent emission control

unless the flush cleaning operation subject to 40 CFR 63, Subpart GG uses either a cleaning solvent listed in Table 1 of 40 CFR 63.744, or a semi-aqueous cleaning solvent. [Authority granted under 40 CFR 63.744 (d); condition originated in DAQE-AN0121168-04].

II.B.25.c.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.25.c.2 **Recordkeeping:**

The permittee shall fulfill all recordkeeping requirements specified in 40 CFR 63.10 (a), (b), (d), and (f). In addition, for each cleaning operation subject to 40 CFR 63, Subpart GG, the permittee shall record the following information, as appropriate, in accordance with paragraphs (b)(1) and (b)(2) of 40 CFR 63.752 (b),.

(1) The name, vapor pressure, and documentation showing the organic HAP constituents of each cleaning solvent used for affected cleaning operations at the facility.

(2) For each cleaning solvent used in hand-wipe cleaning operations that complies with the composition requirements specified in 40 CFR 63.744(b)(1) or for semi-aqueous cleaning solvents used for flush cleaning operations:

(i) The name of each cleaning solvent used;
(ii) All data and calculations that demonstrate that the cleaning solvent complies with one of the composition requirements; and
(iii) Annual records of the volume of each solvent used, as determined from facility purchase records or usage records.

II.B.25.c.3 **Reporting:**

The permittee shall submit semiannual reports occurring every 6 months from the date of the notification of compliance status that certifies that the flush cleaning operations have been in compliance with the applicable standards for the semiannual period. The semiannual report shall also include a statement of compliance signed by a responsible company official certifying that the facility is in compliance with all applicable requirements.

Semiannual compliance reports for each type of operation subject to Subpart GG (i.e. cleaning, primer and topcoat application, depainting, chemical milling maskant application) can be combined into a single semiannual compliance report.

II.B.25.d **Condition:**

All cleaning operations subject to this condition shall comply with the following housekeeping requirements unless they use cleaning solvents that meet the requirements for aqueous or hydrocarbon-based cleaners identified in Table 1 of 40 CFR 63.744 or contain HAP and VOC at concentrations less than 0.1 percent for carcinogens or 1.0 percent for noncarcinogens, as determined from manufacturer's representations:

(1) Place cleaning solvent-laden cloth, paper, or any other absorbent applicators used for cleaning in bags or other closed containers upon completing their use. Ensure that these bags and containers are kept closed at all times except when depositing or removing these materials from the container. Use bags and containers of such design so as to contain the vapors of the cleaning solvent. Cotton-tipped swabs used for very small cleaning operations are exempt from this requirement.

(2) Store fresh and spent cleaning solvents, except semi-aqueous solvent cleaners, used in aerospace cleaning operations in closed containers.

(3) Conduct the handling and transfer of cleaning solvents to or from enclosed systems, vats, waste containers, and other cleaning operation equipment that hold or store fresh or spent cleaning solvents in such a manner that minimizes spills. [Authority granted under 40 CFR 63.744(a); condition originated in DAQE-AN0121168-04].

II.B.25.d.1 **Monitoring:**

A visual inspection of each operation (building or weapon system) shall be made monthly for proper control techniques and work practices to ensure: minimization of fugitive VOC emissions, equipment is in good operating condition, and the proper disposal of waste solvents.

II.B.25.d.2 **Recordkeeping:**

The permittee shall record the date, operation, and results of each inspection required under this provision. The records shall be maintained in accordance with provisions of Section I.S.1 of this permit.

II.B.25.d.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.26 **Conditions on Aerospace NESHAP Coating (Unit #29).**

II.B.26.a **Condition:**

For each primer or topcoat application operation subject to this condition in which any of the coatings that are spray applied contain inorganic HAPs and except as provided in pararaph (4) of this condition, the permittee shall comply with the following applicable requirements, as specified in 40 CFR 63.745 (g)(1) through (g)(3):

(1) Apply these coatings in a booth or hangar in which air flow is directed downward onto or across the part or assembly being coated and exhausted through one or more outlets.

(2) Control the air stream from this operation as follows:

(i) For existing sources, the permittee must choose one of the following:

(A) Before exhausting it to the atmosphere, pass the air stream through a dry particulate filter system certified using the methods described in 40 CFR 63.750(o) to meet or exceed the following efficiency data points in Table 1 and 2: or

Table 1- Two-Stage Arrestor; Liquid Phase Challenge for Existing Sources

Filtration Efficiency Requirement	Aerodynamic Particle Size Range
> 90 %	> 5.7 µm
> 50 %	> 4.1 µm
> 10 %	> 2.2 µm

Table 2- Two-Stage Arrestor; Solid Phase Challenge for Existing Sources

Filtration Efficiency Requirement	Aerodynamic Particle Size Range
> 90 %	> 8.1 µm
> 50 %	> 5.0 µm

> 10 %	> 2.6 µm

(B) Before exhausting it to the atmosphere, pass the air stream through a waterwash system that shall remain in operation during all coating application operations; or

(C) Before exhausting it to the atmosphere, pass the air stream through an air pollution control system that meets or exceeds the efficiency data points in Tables 1 and 2 of this section and is approved by the permitting authority.

(ii) For new sources, either:

(A) Before exhausting it to the atmosphere, pass the air stream through a dry particulate filter system certified using the methods described in 40 CFR 63.750(o) to meet or exceed the following efficiency data points in Table 3 and 4: or

Table 3- Three-Stage Arrestor; Liquid Phase Challenge for New Sources

Filtration Efficiency Requirement	Aerodynamic Particle Size Range
> 95 %	> 2.0 µm
> 80 %	> 1.0 µm
> 65 %	> 0.42 µm

Table 4- Three-Stage Arrestor; Solid Phase Challenge for New Sources

Filtration Efficiency Requirement	Aerodynamic Particle Size Range
> 95 %	> 2.5 µm
> 85 %	> 1.1 µm
> 75 %	> 0.70 µm

(B) Before exhausting it to the atmosphere, pass the air stream through an air pollution control system that meets or exceeds the efficiency data points in Tables 3 and 4 of this section and is approved by the permitting authority.

(iii) New sources that have commenced construction or reconstruction after June 6, 1994 but prior to October 29, 1996 may comply with the following requirements in lieu of the requirements in paragraph(2)(ii):

(A) Pass the air stream through either a two-stage dry particulate filter system or a waterwash system before exhausting it to the atmosphere.

(B) If the primer or topcoat contains chromium or cadmium, control shall consist of a HEPA filter system, three-stage filter system, or other control system equivalent to the three-stage filter system as approved by the Executive Secretary.

(iv) If a dry particulate filter system is used, the following requirements shall be met:

(A) Maintain the system in good working order;

(B) Install a differential pressure gauge across the filter banks;

(C) Continuously monitor the pressure drop across the filter and read and record the pressure drop once per shift; and

(D) Take corrective action when the pressure drop exceeds or falls below the filter manufacturer's recommended limit(s).

(v) If a conventional waterwash system is used, continuously monitor the water flow rate and read and record the water flow rate once per shift. If a pumpless system is used, continuously monitor the booth parameter(s) that indicate performance of the booth per the manufacturer's recommendations to maintain the booth within the acceptable operating efficiency range and read and record the parameters once per shift.

(3) If the pressure drop across the dry particulate filter system, as recorded pursuant to 40 CFR63.752(d)(1), is outside the limit(s) specified by the filter manufacturer or in locally prepared operating procedures, shut down the operation immediately and take corrective action. If the water path in the waterwash system fails the visual continuity/flow characteristics check, or the water flow rate recorded pursuant to 40 CFR63.752(d)(2) exceeds the limit(s) specified by the booth manufacturer or in locally prepared operating procedures, or the booth manufacturer's or locally prepared maintenance procedures for the filter or waterwash system have not been performed as scheduled, shut down the operation immediately and take corrective action. The operation shall not be resumed until the pressure drop or water flow rate is returned within the specified limit(s).

(4) The requirements of paragraphs(1) through (3), specified above, do not apply to the following:

(i) Touch-up of scratched surfaces or damaged paint;
(ii) Hole daubing for fasteners;
(iii) Touch-up of trimmed edges;
(iv) Coating prior to joining dissimilar metal components;
(v) Stencil operations performed by brush or airbrush;
(vi) Section joining;
(vii) Touch-up of bushings and other similar parts;
(viii) Sealant detackifying;
(ix) Painting parts in an area identified in a Title V permit, where the Executive Secretary has determined that it is not technically feasible to paint the parts in a booth; and
(x) The use of hand-held spray can application methods.

(5) For a primer or topcoat application operation that emits inorganic HAP, the operation is in compliance when:

(i) It is operated according to the requirements specified in paragraphs (1) through (3) of this condition ;and
(ii) It is shut down immediately whenever the pressure drop or water flow rate is outside the limit(s) established for them and is not restarted until the pressure drop or water flow rate is returned within these limit(s), as required under paragraph (3) of this condition.

(6) Dry particulate filters used to comply with paragraph (2) of this condition must be certified by the filter manufacturer or distributor, paint/depainting booth supplier, and/or the permittee using method 319 in appendix A of subpart A of this part, to meet or exceed the efficiency data points in paragraph 2(i)(A) and 2(ii)(A) of this condition respectively. [Authority granted under 40 CFR 63.745 (g); condition originated in DAQE-AN0121168-04].

II.B.26.a.1 **Monitoring:**

When a dry particulate filter system is used to meet the requirements of 40 CFR 63.745(g)(2), the permittee shall, while the primer or topcoat application operations are occurring, continuously monitor the pressure drop across the system and read and record the pressure drop once per shift following the recordkeeping requirements of 40 CFR 63.752(d).

When a conventional waterwash system is used to meet the requirements of 40 CFR 63.745(g)(2), the permittee shall, while the primer or topcoat application operations are occurring, continuously monitor the water flow rate through the system and read and record the water flow rate once per shift following the recordkeeping requirements of 40 CFR 63.752(d).

When a pumpless waterwash system is used to meet the requirements of 40 CFR 63.745(g)(2), the permittee shall, while primer and topcoat application operations are occurring, measure and record the parameter(s) recommended by the booth manufacturer that indicate booth performance once per shift, following the recordkeeping requirements of 40 CFR 63.752(d)

II.B.26.a.2 **Recordkeeping:**

If the permittee is complying with 40 CFR 63.745(g) for the control of inorganic HAP emissions from primer and topcoat application operations through the use of a dry particulate filter system or a HEPA filter system, they shall record the pressure drop across the operating system once each shift during which coating operations occur.

If the permittee is complying with 40 CFR 63.745(g) through the use of a conventional waterwash system, they shall record the water flow rate through the operating system once each shift during which coating operations occur.

If the permittee is complying with 40 CFR 63.745(g) through the use of a pumpless waterwash system, they shall record the parameter(s) recommended by the booth manufacturer that indicate the performance of the booth once each shift during which coating operations occur.

A log including the acceptable limit(s) of pressure drop, water flow rate, or for the pumpless waterwash booth, the booth manufacturer recommended parameter(s) that indicate the booth performance, as applicable, shall be maintained. The acceptable limits shall be as specified by the filter or booth manufacturer or in locally prepared operating procedures

II.B.26.a.3 **Reporting:**

(1) The permittee shall submit semiannual reports occurring every 6 months from the date of the notification of compliance status that identify:

(a) Each exceedance of the operating parameter(s) established for the control device under the initial performance test during which compliance was demonstrated;

(b) All times when a primer or topcoat application operation was not immediately shut down when the pressure drop across a dry particulate filter or HEPA filter system, the water flow rate through a conventional waterwash system, or the recommended parameter(s) that indicate the booth performance for pumpless systems, as appropriate, was outside the limit(s) specified by the filter or booth manufacturer or in locally prepared operating procedures;

(c) If the coating operations have been in compliance for the semiannual period, a statement that the coating operations have been in compliance with the applicable

standards; and,

The semiannual report shall also include a statement of compliance signed by a responsible company official certifying that the facility is in compliance with all applicable requirements.

Semiannual compliance reports for each type of operation subject to Subpart GG (i.e. cleaning, primer and topcoat application, depainting, chemical milling maskant application) can be combined into a single semiannual compliance report.

(2) The permittee shall submit annual reports beginning 12 months after the date of the notification of compliance status listing the number of times the pressure drop or water flow rate for each dry filter or waterwash system, as applicable, was outside the limit(s) specified by the filter or booth manufacturer or in locally prepared operating procedures.

II.B.26.b **Condition:**

Except as provided in paragraph (3), the permittee shall comply with the following application requirements specified in 40 CFR 63.745 (f)(1) and (f)(2), for all primer or topcoat (including self-priming topcoats) application operations subject to this condition in which any of the coatings contain organic HAP or VOCs.

(1) All primers and topcoats (including self-priming topcoats) shall be applied using one or more of the following application techniques, as specified in paragraphs 40 CFR 63.745 (f)(1)(i) through (f)(1)(ix):

(i) Flow/curtain coat application;
(ii) Dip coat application;
(iii) Roll coating;
(iv) Brush coating;
(v) Cotton-tipped swab application;
(vi) Electrodeposition (dip) coating;
(vii) High volume low pressure (HVLP) spraying;
(viii) Electrostatic spray application; or
(ix) Other coating application methods that achieve emission reductions equivalent to HVLP or electrostatic spray application methods, as determined according to the requirements in 40 CFR63.750(i).

(2) All application devices used to apply primers or topcoats (including self-priming topcoats) shall be operated according to company procedures, local specified operating procedures, and/or the manufacturer's specifications, whichever is most stringent, at all times. Equipment modified by the facility shall maintain a transfer efficiency equivalent to HVLP and electrostatic spray application techniques.

(3) The following situations are exempt from the requirements of paragraph (1):

(i) Any situation that normally requires the use of an airbrush or an extension on the spray gun to properly reach limited access spaces;
(ii) The application of coatings that contain fillers that adversely affect atomization with HVLP spray guns and that the UDAQ has determined cannot be applied by any of the application methods specified in paragraph(1);
(iii) The application of coatings that normally have a dried film thickness of less than 0.0013

centimeter (0.0005 in.) and that the permitting agency has determined cannot be applied by any of the application methods specified in paragraph(1);

(iv) The use of airbrush application methods for stenciling, lettering, and other identification markings;

(v) The use of hand-held spray can application methods; and

(vi) Touch-up and repair operations.

If the permittee is seeking to use an alternative application method (as allowed in 40 CFR 63.745(f)(1)(ix)) in complying with the standards for primers and topcoats, he/she shall use the procedures specified in 40 CFR 63.749 paragraphs(i)(2)(i) and (i)(2)(ii) or (i)(2)(iii) to determine the organic HAP and VOC emission levels of the alternative application technique as compared to either HVLP or electrostatic spray application methods. [Authority granted under 40 CFR 63.745 (f); condition originated in DAQE-AN0121168-04].

II.B.26.b.1 **Monitoring:**

At least every six months, the permittee shall review each primer and topcoat application operation to verify compliance with the requirements of this condition.

II.B.26.b.2 **Recordkeeping:**

An operator's log shall be maintained which shall include the results of the monitoring required. All records shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.26.b.3 **Reporting:**

The permittee shall submit semiannual reports occurring every 6 months from the date of the notification of compliance status that certifies that the coating operations have been in compliance with the applicable standards for the semiannual period. The semiannual report shall also include a statement of compliance signed by a responsible company official certifying that the facility is in compliance with all applicable requirements.

Semiannual compliance reports for each type of operation subject to Subpart GG (i.e. cleaning, primer and topcoat application, depainting, chemical milling maskant application) can be combined into a single semiannual compliance report.

II.B.26.c **Condition:**

For each primer or topcoat application operations subject to this condition that uses coatings that are uncontrolled (no control device is used to reduce organic HAP emissions from the operation), the permittee shall comply with the following organic HAP and VOC content limits, as specified in paragraphs (c)(1) through (c)(4) of 40 CFR 63.745 (c) :

(1) Organic HAP emissions from primers shall be limited to an organic HAP content level of no more than: 350 g/L (2.9 lb/gal) of primer (less water) as applied or 540 g/L (4.5 lb/gal) of primer (less water) as applied for general aviation rework facilities.

(2) VOC emissions from primers shall be limited to a VOC content level of no more than: 350 g/L (2.9 lb/gal) of primer (less water and exempt solvents) as applied or 540 g/L (4.5 lb/gal) of primer (less water and exempt solvents) as applied for general aviation rework facilities.

(3) Organic HAP emissions from topcoats shall be limited to an organic HAP content level of no more than: 420 g/L (3.5 lb/gal) of coating (less water) as applied or 540 g/L (4.5 lb/gal) of coating (less water) as applied for general aviation rework facilities. Organic HAP emissions from self-priming

topcoats shall be limited to an organic HAP content level of no more than: 420 g/L (3.5 lb/gal) of self-priming topcoat (less water) as applied or 540 g/L (4.5 lb/gal) of self-priming topcoat (less water) as applied for general aviation rework facilities.

(4) VOC emissions from topcoats shall be limited to a VOC content level of no more than: 420 g/L (3.5 lb/gal) of coating (less water and exempt solvents) as applied or 540 g/L (4.5 lb/gal) of coating (less water and exempt solvents) as applied for general aviation rework facilities. VOC emissions from self-priming topcoats shall be limited to a VOC content level of no more than: 420 g/L (3.5 lb/gal) of self-priming topcoat (less water and exempt solvents) as applied or 540 g/L (4.5 lb/gal) of self-priming topcoat (less water) as applied for general aviation rework facilities.

(5) Compliance with the organic HAP and VOC content limits specified in paragraphs (1) through (4) shall be accomplished by using the following methods, as specified in 40 CFR 63.745 paragraphs (e)(1) and (e)(2), either by themselves or in conjunction with one another:

(i) Use primers and topcoats (including self-priming topcoats) with HAP and VOC content levels equal to or less than the limits specified in paragraphs (1) through (4) above; or

(ii) Use the averaging provisions described in 40 CFR 63.743(d).

(6) The permittee shall conduct the handling and transfer of primers and topcoats to or from containers, tanks, vats, vessels, and piping systems in such a manner that minimizes spills. [Authority granted under 40 CFR 63.745; condition originated in DAQE-AN0121168-04].

II.B.26.c.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.26.c.2 **Recordkeeping:**

The permittee shall record the following information, as appropriate, when complying with the organic HAP and VOC content limits established by this condition, in accordance with paragraphs (c)(1) through (c)(4) of 40 CFR 63.752 :

(1) The name and VOC content as received and as applied of each primer and topcoat used at the facility.

(2) For uncontrolled primers and topcoats that meet the organic HAP and VOC content limits specified in paragraphs (1) through (4) of this condition, without averaging:

(i) The mass of organic HAP emitted per unit volume of coating as applied (less water) (Hi) and the mass of VOC emitted per unit volume of coating as applied (less water and exempt solvents) (Gi) for each coating formulation within each coating category used each month (as calculated using the procedures specified in 40 CFR 63.750(c) and (e));
(ii) All data, calculations, and test results (including EPA Method 24 results) used in determining the values of Hi and Gi; and
(iii) The volume (gal) of each coating formulation within each coating category used each month.

(3) For "low HAP content" uncontrolled primers with organic HAP content less than or equal to 250 g/l (2.1 lb/gal) less water as applied and VOC content less than or equal to 250 g/l (2.1 lb/gal) less water and exempt solvents as applied:

(i) Annual purchase records of the total volume of each primer purchased; and

(ii) All data, calculations, and test results (including EPA Method 24 results) used in determining the organic HAP and VOC content as applied. These records shall consist of the manufacturer's certification when the primer is applied as received, or the data and calculations used to determine Hi if not applied as received.

(4) For primers and topcoats complying with the organic HAP or VOC content level by averaging:

(i) The monthly volume-weighted average masses of organic HAP emitted per unit volume of coating as applied (less water) (Ha) and of VOC emitted per unit volume of coating as applied (less water and exempt solvents) (Ga) for all coatings (as determined by the procedures specified in 40 CFR 63.750(d) and (f)); and

(ii) All data, calculations, and test results (including EPA Method 24 results) used to determine the values of Ha and Ga.

II.B.26.c.3 **Reporting:**

The permittee shall submit semiannual reports occurring every 6 months from the date of the notification of compliance status that identify:

(a) For primers and topcoats where compliance is not being achieved through the use of averaging, each value of Hi (the mass of organic HAP emitted per unit of volume as applied (less water)) and (Gi) (the mass of VOC emitted per unit of volume of coating as applied (less water and exempted solvents)), as recorded under 40 CFR 63.752(c)(2)(i), that exceeds the applicable organic HAP or VOC content limit specified in 40 CFR 63.745(c);

(b) For primers and topcoats where compliance is being achieved through the use of averaging, each value of Ha (the monthly volume-weighted average masses of organic HAP emitted per unit of volume as applied (less water)) and Ga (the monthly volume-weighted average masses of VOC emitted per unit of volume of coating as applied (less water and exempted solvents)), as recorded under 40 CFR 63.752(c)(4)(i), that exceeds the applicable organic HAP or VOC content limit specified in 40 CFR 63.745(c);

(c) If the coating operations have been in compliance for the semiannual period, a statement that the coating operations have been in compliance with the applicable standards; and,

The semiannual report shall also include a statement of compliance signed by a responsible company official certifying that the facility is in compliance with all applicable requirements.

II.B.27 **Conditions on Aerospace NESHAP Chemical Depainting (Unit #30).**

II.B.27.a **Condition:**

(1) Each aerospace depainting operation subject to this condition shall emit no organic HAP from chemical stripping formulations and agents or chemical paint softeners, except as provided in 40 CFR 63.746(b)(2) (see NESHAP abrasive blasting condition in this permit) and paragraph (2) below:

(2) The permittee shall not, on an annual average basis, use more than 50 gallons of organic HAP-containing chemical strippers or alternatively 365 pounds of organic HAP per military aircraft depainted for spot stripping and decal removal.

(3) In accordance with 40 CFR 63.746 (b)(5), mechanical and hand sanding operations are exempt from the requirements of this permit condition. [Authority granted under 40 CFR 63.746 (b); condition originated in 40 CFR 63.746 (b)].

II.B.27.a.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.27.a.2 **Recordkeeping:**

For all emission units subject to the depainting standards specified in 40 CFR 63.746, the permittee shall record the following information, as appropriate, in accordance with paragraphs (e)(1), (e)(4), and (e)(7) of 40 CFR 63.752:

(1) For all chemical strippers used in the depainting operation:

(i) The name of each chemical stripper; and

(ii) Monthly volumes of each organic HAP containing chemical stripper used or monthly weight of organic HAP-material used for spot stripping and decal removal.

(2) For each type of aircraft depainted at the facility, a listing of the parts, subassemblies, and assemblies normally removed from the aircraft before depainting. Prototype, test model or aircraft that exist in low numbers (i.e., less than 25 aircraft of any one type) are exempt from this requirement.

(3) For spot stripping and decal removal, the permittee shall record the volume of organic HAP-containing chemical stripper or weight of organic HAP used, the annual average volume of organic HAP-containing chemical stripper or weight of organic HAP used per aircraft, the annual number of aircraft stripped, and all the data and calculations used.

The log shall be maintained in accordance with the requirements of Provision S.1 in Section I of this permit.

II.B.27.a.3 **Reporting:**

(1) The permittee shall submit semiannual reports occurring every 6 months from the date of the notification of compliance status that identify:

(i) Any 24-hour period where organic HAP were emitted from the depainting of aerospace vehicles, other than from the exempt operations listed in 40 CFR 63.746 (a), (b)(3), and (b)(5).

(ii) Any new chemical strippers used at the facility during the reporting period;

(iii) The organic HAP content of these new chemical strippers;

(iv) For each chemical stripper that undergoes reformulation, its organic HAP content;

(v) For periods of malfunctions:

(A) The date that the malfunction occurred;
(B) A description of the malfunction;
(C) The methods used to depaint aerospace vehicles during the malfunction period;
(D) The dates that these methods were begun and discontinued; and
(E) The date that the malfunction was corrected;

(vi) A list of new and discontinued aircraft models depainted at the base over the last 6 months and a list of the parts normally removed for depainting for each new aircraft model being depainted; and

(vii) If the depainting operation has been in compliance for the semiannual period, a statement signed by a responsible company official that the depainting operation was in compliance with the applicable standards. The semiannual report shall also include a statement of compliance signed by a responsible company official certifying that the facility is in compliance with all applicable requirements.

Semiannual compliance reports for each type of operation subject to Subpart GG (i.e. cleaning, primer and topcoat application, depainting, chemical milling maskant application) can be combined into a single semiannual compliance report.

(1) The permittee shall submit annual reports occurring every 12 months from the date of the notification of compliance status that identify:

(i) The average volume per aircraft of organic HAP-containing chemical strippers or weight of organic HAP used for spot stripping and decal removal operations if it exceeds the limits specified in 40 CFR 63.746(b)(3)

II.B.28 **Conditions on Surface Coating of Miscellaneous Metal Parts (Unit #31).**

II.B.28.a **Condition:**

For all applications of surface coatings to miscellaneous metal parts not subject to 40 CFR 63, Subpart GG, the permittee may not cause, allow or permit discharge to the atmosphere of any volatile organic compounds in excess of:

(a) 4.3 pounds per gallon of coating, excluding water and solvents exempt from the definition of volatile organic compound, delivered to a coating applicator that applies clear coating;
(b) 3.5 pounds per gallon of coating, excluding water and solvents exempt from the definition of volatile organic compound, delivered to a coating applicator in a coating application system that utilizes air or forced warm air at temperatures up to194 degrees F;

(c) 3.5 pounds per gallon of coating, excluding water and solvents exempt from the definition of volatile organic compound, delivered to a coating applicator that applies extreme performance coatings;

(d) 3.0 pounds per gallon of coating, excluding water and solvents exempt from the definition of volatile organic compound, delivered to a coating applicator for all other coating and coating application systems.

If low VOC content coatings are used to comply with the VOC emission limitations discussed above, the permittee shall express emissions in terms of pounds of VOC per gallon of coating less water or exempt solvent. If add-on controls or transfer efficiency improvements are used to comply with the VOC emission limitations discussed above, the permittee shall perform the equivalency calculations described in EPA 340/1-86-016 Guideline for Surface Coating Calculations to demonstrate compliance with VOC emissions in units of lbs. VOC/gallon of solid rather than in units of lbs.VOC/gallon of coating. The equivalent emission limit for air-dried items is 6.7 lbs. VOC/gallon solids. The equivalent emission limit for clear-coated items is 10.3 lbs. VOC/gallon solids. The equivalent emission limit for extreme performance coatings is 6.7 lbs. VOC/gallon solids. The equivalent emission limit for other coatings and systems is 5.1 lbs. VOC/gallon solids.

If more than one emission limitation indicated in this section applies to a specific coating, then the least stringent emission limitation shall apply. All volatile organic compound emissions from solvent washing involved in a coating process shall be considered in the emission limitations set above, unless the solvent is directed into containers that prevent evaporation into the atmosphere.

Specialty coatings are exempted from the requirement of this provision. [Authority granted under R307-340-11; condition originated in DAQE-AN0121168-04].

II.B.28.a.1 **Monitoring:**

By the 30th of each month (or the 28th for February), the permittee shall determine compliance with R307-340-11. Compliance calculation procedures shall meet the requirements of R307-340-15.

II.B.28.a.2 **Recordkeeping:**

The permittee shall maintain records of the daily use of all coatings and other materials that may be a source of VOC emissions. The recording format shall meet the requirements of R307-340 and shall contain all the information necessary to determine compliance with the VOC content limits on a daily basis. Records of daily use may be based on purchase and/or issue records. Results of monitoring shall be maintained as described in Provision I.S.1 of this permit.

II.B.28.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.28.b **Condition:**

(1) When applied to parts and components not subject to 40 CFR 63, Subpart GG, the following specialty coatings, including any VOC-containing materials added to the original coating supplied by the manufacturer, shall contain VOCs not exceeding the following limits:

Coating Type	VOC Content (g/L)
Ablative Coating	600
Adhesion Promoter	890

Adhesive Bonding Primer Cured at 250 F or below	850
Adhesive Bonding Primer Cured above 250 F	1030
Commericial Interior Adhesive	760
Cyanoacrylate Adhesive	1020
Fuel Tank Adhesive	620
Nonstructural Adhesive	360
Rocket Motor Bonding Adhesive	890
Rubber-based Adhesive	850
Structural Autoclavable Adhesive	60
Structural Nonautoclavable Adhesive	850
Bearing Coating	620
Caulking and Smoothing Compounds	850
Antichafe Coating	660
Chemical Agent-Resistant Coating	550
Clear Coating	720
Commercial Exterior Aerodynamic Structure Primer	650
Compatible Substrate Primer	780
Corrosion Prevention Compound	710
Cryogenic Flexible Primer	645
Cryoprotective Coating	600
Electric or Radiation -Effect Coating	800
Electrostatic Discharge and Electromagnetic Interference (EMI) Coating	800
Elevated temperature Skydrol Resistant Commercial Primer	740
Epoxy Polyamide Topcoat	660
Fire-Resistent (interior) Coating	800
Flexible Primer	640
Flight Test Coatings - Missile or Single Use Aircraft	420
Flight Test Coatings - All Other	840
Fuel-Tank Coating	720
High-Temperature Coating	850
Insulation Covering	740
Intermediate Release Coating	750
Lacquer	830
Bonding Maskant	1230
Critical Use and Line Sealer Maskant	1020
Seal Coat Maskant	1230
Metallized Epoxy Coating	740
Mold Release	780
Optical Anti-Reflective Coating	750
Part Marking Coating	850
Pretreatment Coating	780
Rain erosion-Resistant Coating	850
Rocket Motor Nozzle Coating	660
Scale Inhibitor	880
Screen Print Ink	840
Extrudable/Rollable/Brushable Sealant	240
Sprayable Sealant	600
Silicone Insulation Material	850
Solid Film Lubricant	880
Self-priming Topcoat	420
Specialized Function Coating	890
Temporary Protective Coating	320
Thermal Control Coating	800
Wet Fastener Installation Coating	675

(2) The permittee may comply with the VOC content provisions of paragraph (1) by using approved air pollution control equipment provided that the control system has combined VOC emissions capture and control equipment efficiency of at least 81 percent by weight.

(3) The VOC content provisions of paragraph (1) do not apply to:

(a) manufacturing or rework operations involving space vehicles,
(b) rework operations performed on antique aerospace vehicles or components, or
(c) the following activities where cleaning and coating of aerospace components and vehicles may take place:
(i) research and development
(ii) quality control
(iii) laboratory testing
(iv) electronic parts and assemblies (except for cleaning and coating of completed assemblies

(4) The following coating applications are exempt from the VOC content limits of paragraph (1):

(a) Touch up, aerosol and DOD classified coatings,
(b) Coatings used on space vehicles,
(c) Facilities that use separate formulations in volume of less than 50 gallons per year, subject to a maximum exemption of 200 gallons for all formulations applied annually. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121168-04].

II.B.28.b.1 **Monitoring:**

(1) When complying with VOC content limits specified in Paragraph (1) through the use of compliant specialty coatings, records required for this permit condition will serve as monitoring.

(2) When complying with VOC content limits specified in Paragraph (1) through the use of an approved air pollution control equipment, the permittee shall submit a monitoring plan that specifies the applicable operating parameter value, or range of values, to ensure ongoing compliance with the VOC content limits. The monitoring device shall be installed, calibrated, operated, and maintained in accordance with the manufacturer's specifications.

II.B.28.b.2 **Recordkeeping:**

(1) For each coating operation using specialty coatings listed in paragraph (a)(1)(i), the permittee shall:

(a) Maintain a current list of coatings in use with category and VOC content as applied.
(b) Record coating usage on an annual basis based on purchase and/or issue records.

(2) For each coating operation using a control equipment under paragraph (a)(1)(ii) shall record monitoring parameters as specified in the monitoring plan required.

II.B.28.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.29 **Conditions on Miscellaneous Operations in Building 238 (Unit #32).**

II.B.29.a **Condition:**

Visible emissions from the baghouse and all the affected operations in Building 238 shall be no greater than 10 percent opacity except for a period not exceeding 1 minute in any hour. [Authority granted under R307-401-8(1)(a) [BACT]; condition originated in DAQE-DAQE-AN0101210184-07].

II.B.29.a.1 **Monitoring:**

An opacity survey of each affected emission unit shall be performed once each month that the unit operates, by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. The individual is not required to be a certified visible emissions observer (VEO). If any visible emissions are observed, an opacity determination of that emission unit shall be performed by a certified VEO in accordance with 40 CFR 60, Appendix A, Method 9.

II.B.29.a.2 **Recordkeeping:**

The permittee shall record the date of each visual opacity survey and keep a list of the emission points checked during the visual opacity survey. The permittee shall also keep a log of the following information for each observed visual emission: date and time visual emissions observed, emission point location and description, time and date of opacity test, and percent opacity. The records required by this provision and all data required by 40 CFR 60, Appendix A, Method 9 shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.29.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.30 **Conditions on Wood working baghouse in Building 849 (Unit #34).**

II.B.30.a **Condition:**

Visible emissions shall be no greater than 10 percent opacity. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-1098-97].

II.B.30.a.1 **Monitoring:**

A visual opacity survey of each affected emission unit shall be performed on a monthly basis by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If visible emissions other than steam are observed from an emission unit, an opacity determination of that emission unit shall be performed by a certified observer within 24 hours of the initial survey. The opacity determination shall be performed in accordance with 40 CFR 60, Appendix A, Method 9.

II.B.30.a.2 **Recordkeeping:**

The permittee shall record the date of each visual opacity survey and keep a list of the emission points checked during the visual opacity survey. The permittee shall maintain all the records required by this provision and all data required by 40 CFR 60, Appendix A, Method 9 in accordance with Provision I.S.1 of this permit.

II.B.30.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.31 **Conditions on Bake Oven in Building 1701 (Unit #35).**

II.B.31.a **Condition:**

Natural gas consumption shall be no greater than 2.2 MMSCF per rolling 12 month period. [Authority granted under R307-401-8(1)(a) [BACT]; condition originated in DAQE-AN0121162-04].

II.B.31.a.1 **Monitoring:**

By the 30th day (28th day for February) of each month, a rolling 12-month total shall be determined using records from the previous 12 months.

II.B.31.a.2 **Recordkeeping:**

Records of natural gas used for the bake oven shall be kept for all periods and shall be maintained as described in Provision I.S.1 of this permit.

II.B.31.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.32 **Conditions on Aggregated Boiler Group (Unit #36).**

II.B.32.a **Condition:**

Visible emissions shall be no greater than 20 percent opacity. [Authority granted under R307-401-8(1)(a) [BACT]; condition originated in DAQE-AN101210181-07].

II.B.32.a.1 **Monitoring:**

A. For emission units operating on natural gas only, in lieu of monitoring via visible emission observations the permittee shall monitor fuel usage to demonstrate that only pipeline-quality natural gas is being used as fuel.

B. For all other emission units operating on fuel other than natural gas, the permittee shall apply one of the following monitoring techniques to each affected emission unit when in operation:

(1) Monthly visual opacity survey conducted by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If any visible emissions other than condensed water vapor are observed from an emission point, an opacity determination of that emission point shall be performed in accordance with 40 CFR 60, Method 9 within 24 hours of the initial visual opacity survey or upon startup if the unit must be shutdown for maintenance. If the unit must be permanently removed from service, no follow-up opacity determination is required.

(2) Quarterly photogrametric opacity observations conducted by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If an opacity of 15 percent or more is detected by the photogrametric analysis, an opacity determination of that emission point shall be performed in accordance with 40 CFR 60, Appendix A, Method 9 within 24 hours of the initial photogrametric opacity observation survey or upon startup if the unit must be shutdown for maintenance. If the unit must be permanently removed from service, no follow-up opacity determination is required.

(3) An annual opacity determination performed in accordance with 40 CFR 60, Appendix A, Method 9.

The monitoring option selected can vary from unit to unit. For example, if quarterly photogrametric opacity observations are being conducted for a given unit and the permittee cannot conduct a photogrametric opacity observation in a quarter that unit operated, an opacity determination conducted in accordance with the procedures of 40 CFR 60, Appendix A, Method 9 will satisfy the monitoring requirements of this condition.

II.B.32.a.2 **Recordkeeping:**

For emission units fired on natural gas, the permittee shall maintain records such as gas bills, and gas meter readings to demonstrate natural gas usage. Records shall be maintained as described in Provision I.S of this permit.

For all other emission units, the permittee shall maintain a log of monthly visual opacity surveys, quarterly photogrametric observations, and/or annual opacity determinations which includes the following information for each affected emission unit: the date and time of each visual opacity survey, photogrametric opacity observation, annual opacity determination, the specific monitoring technique used (visual opacity survey, 40 CFR 60 Appendix A Method 9 or photogrametric observation) and the result of the opacity monitoring. The records required by this provision and all data required by 40 CFR 60, Appendix A, Method 9 shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.32.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.32.b **Condition:**

The combined heat input to all natural gas-fired boilers at Hill Air Force Base and Little Mountain shall not exceed 2.76E12 BTU per rolling 12-Month period. This heat input limit shall not apply to any boilers in which combustion takes place at no greater pressure than 1 inch of mercury above ambient pressure with a rated capacity of less than 5 MMBTU/hr using no other fuel than natural gas, LPG or equivalent, any boiler with a rated capacity of less than 1 MMBTU/hr if fueled only by fuel oil numbers 1 to 6, or any boiler installed prior to November 29, 1969 (grandfathered sources). [Authority granted under R307-401-8(1)(a) [BACT]; condition originated in DAQE- AN101210181-07].

II.B.32.b.1 **Monitoring:**

The fuel use for all affected boilers shall be monitored monthly. Within 30 days of the previous month, the 12-month total heat input from all affected boilers shall be calculated using fuel use records and the following heat conversion factors:

1. For JP-8, 123,000 BTU/gallon
2. For JP-10, 141,500 BTU/gallon
3. For No.2 Fuel Oil, 141,000 BTU/gallon
4. For Diesel Fuel, 137,000 BTU/gallon
5. For Natural Gas/ Propane, 1020 BTU/SCF
6. For Used Oil, 141,000 BTU/gallon

II.B.32.b.2 **Recordkeeping:**

The records required for monitoring shall be maintained as described by Provision S.1 in Section I of this permit.

II.B.32.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.32.c **Condition:**

Emission of NO_x shall not exceed the following:

AQUIS#	NO_x Emission Limit, lbs/hr
3507	7.88
3508	7.88
3501	7.20
3502	7.20
3519	5.40

Emission limits are calculated as the product of 0.09 lb/MMBtu * Rated Capacity in MMBtu/hr. [Authority granted under R307-401-8(1)(a) [BACT]; condition originated in DAQE-AN101210181-07].

II.B.32.c.1 **Monitoring:**

Stack testing shall be performed as specified below:

(a) Frequency. Emissions shall be tested every three (3) years, based on the most recent stack test.

(b) Notification. At least 30 days before the test, the source shall notify the Executive Secretary of the date, time, and place of testing and provide a copy of the test protocol. The source shall attend a pretest conference if determined necessary by the Executive Secretary.

(c) Methods.

(1) Sample Location - the emission point shall conform to the requirements of 40 CFR 60, Appendix A, Method 1, and Occupational Safety and Health Administration (OSHA) approved access shall be provided to the test location.

(2) 40 CFR 60, Appendix A, Method 7, 7A, 7B, 7C, 7D, or 7E shall be used to determine the pollutant emission rate.

(3) 40 CFR 60, Appendix A, Method 2, or Method 19 shall be used to determine the volumetric flow rate.

(d) Calculations. To determine mass emission rates (lb/hr, etc.) the pollutant concentration as determined by the appropriate methods above shall be multiplied by the volumetric flow rate and any necessary conversion factors determined by the Executive Secretary to give the results in the specified units of the emission limitation.

(e) Production Rate During Testing. The production rate during all compliance testing shall be no less than 90% of the maximum production achieved in the previous three (3) years unless the Executive Secretary or representative agrees to an alternative production rate.

II.B.32.c.2 **Recordkeeping:**

Results of all stack testing shall be recorded and maintained in accordance with the associated test method and Provision S.1 in Section I of this permit.

II.B.32.c.3 **Reporting:**

The results of stack testing shall be submitted to the Executive Secretary within 60 days of completion of the testing. Reports shall clearly identify results as compared to permit limits and indicate compliance status. There are no additional reporting requirements for this provision except those specified in Section I of this permit.

II.B.33 **Conditions on NSPS Boilers (Unit #37).**

II.B.33.a **Condition:**

Sulfur content of any fuel combusted shall be no greater than 0.5 percent by weight. [Authority granted under 40 CFR 60.42c(d) and (i); condition originated in 40 CFR 60.42c (d)].

II.B.33.a.1 **Monitoring:**

For each delivery of fuel oil or diesel, the permittee shall either:

(1) Determine the fuel sulfur content expressed as wt% in accordance with the methods of the American Society for Testing Materials (ASTM); or

(2) Inspect the fuel sulfur content expressed as wt% determined by the vendor using methods of the ASTM; or

(3) Inspect documentation provided by the vendor that demonstrates compliance with this provision (directly or indirectly).

II.B.33.a.2 **Recordkeeping:**

For each fuel load received, the permittee shall maintain either fuel receipt records showing sulfur content of the delivered fuel or records of all sulfur content testing performed on the delivered fuel. These records shall be maintained in accordance with Provision I.S.1. of this permit.

II.B.33.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.33.b **Condition:**

The permittee shall keep records of the amounts of each fuel combusted each month, for each affected emission unit. [Authority granted under 40 CFR 60.48c(g); condition originated in 40 CFR 60.48c (g)].

II.B.33.b.1 **Monitoring:**

Fuel consumption for each affected emission unit shall be determined by a fuel meter.

II.B.33.b.2 **Recordkeeping:**

Records of the amounts of each fuel combusted during each month for each affected unit shall be maintained as described in Provision I.S.1 of this permit.

II.B.33.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.34 **Conditions on Solvent Distillation Units (Unit #40).**

II.B.34.a **Condition:**

The total amount of non exempt paint and solvents distilled shall be no greater than 40,000 gallons per rolling 12 month period for both units. [Authority granted under R307-401-8(1) [BACT]; condition originated in BAQE-669-88].

II.B.34.a.1 **Monitoring:**

Records of consumption shall be kept on a daily basis when in operation. By the 30th of each month (or the 28th for February), the permittee shall calculate a new rolling 12-month total using data from the previous 12 months.

II.B.34.a.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.34.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.35 **Conditions on Basewide Gasoline Stations and Transfer Operations (Unit #41).**

II.B.35.a **Condition:**

For tanks subject to this condition, the permittee shall maintain records of the average monthly storage temperature, the type of liquid, throughput quantities, and the maximum true vapor pressure. [Authority granted under R307-327-4; condition originated in R307-327-4].

II.B.35.a.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.35.a.2 **Recordkeeping:**

The permittee shall maintain records of the average monthly storage temperature, the type of liquid, throughput quantities, and the maximum true vapor pressure in accordance with Provision I.S.1 of this permit.

II.B.35.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.35.b **Condition:**

(1) The permittee shall not transfer or permit the transfer of gasoline from any delivery vessel (i.e. tank truck or trailer) into any stationary storage container with a capacity of 250 gallons or greater unless such container is equipped with a submerged fill pipe and at least 90 percent of the gasoline vapor, by weight, displaced during the filling of the stationary storage container is prevented from being released to the atmosphere. This requirement shall not apply to:

(a) the transfer of gasoline into any stationary storage container of less than 550 gallons used primarily for the fueling of implements of husbandry if such container is equipped with a permanent submerged fill pipe;
(b) the transfer of gasoline into any stationary storage container having a capacity of less than 2,000 gallons which was installed prior to January 1, 1979, if such container is equipped with a permanent submerged fill pipe;
(c) the transfer of gasoline to storage tanks equipped with floating roofs or their equivalent that have been approved by the Executive Secretary.

(2) The 90 percent performance standard of the vapor control system shall be based on operating procedures and equipment specifications. The design effectiveness of such equipment and the operating procedure must be documented and submitted to and approved by the Executive Secretary.

(3) Each gasoline storage tank or gasoline delivery vessel subject to paragraph (1), shall be equipped with vapor control equipment, which includes, but is not limited to:

(a) vapor return lines and connections sufficiently free of restrictions to allow transfer of vapor to the delivery vessel or to the vapor control system, and to achieve the required recovery;
(b) a means of assuring that the vapor return lines are connected to the delivery vessel, or vapor control system, and storage tank during tank filling;
(c) restrictions in the storage tank vent line designed and operated to prevent:

(i) the release of gasoline vapors to the atmosphere during normal operation; and
(ii) gauge pressure in the delivery vessel from exceeding 18 inches of water and vacuum from exceeding 6 inches of water. [Authority granted under R307-328-5; condition originated in R307-328-5].

II.B.35.b.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.35.b.2 **Recordkeeping:**

Records documenting compliance with the design requirements for each affected unit shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.35.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.35.c **Condition:**

(1) The permittee shall only use gasoline transport vehicles designed and maintained to be vapor tight during loading and unloading operations as well as during transport, except for normal pressure venting required under United States Department of Transportation Regulations.

(2) The design of the vapor recovery system shall be such that when the delivery tank is connected to an approved storage tank vapor recovery system or loading terminal, 90% vapor recovery efficiencies are realized. The connectors of the delivery tanks shall be compatible with the fittings on the fill pipes and vapor vents at the storage containers and gasoline loading terminals where the delivery tank will service or be serviced. Adaptors may be used to achieve compatibility.

(3) The permittee shall not knowingly allow the introduction of gasoline into, dispensing of gasoline from, or transportation of gasoline in a gasoline transport vehicle without a current Utah Vapor Tightness Certificate.

(4) A vapor-laden transport vehicle may be refilled only at installations equipped to recover, process or dispose of vapors. Transport vehicles that only service locations with storage containers specifically exempted from the requirements of R307-328-5 need not be retrofitted to comply with the requirements of R307-328-6(1)-(3), provided such transport vehicles are loaded through a submerged fill pipe or approved equivalent equipment. The design and effectiveness of all equivalent equipment shall be documented and submitted for approval by the Executive Secretary. [Authority granted under R307-328-6; condition originated in R307-328-6 and R307-328-7].

II.B.35.c.1 **Monitoring:**

(1) All gasoline tank trucks and their vapor collection systems shall be tested for leakage annually between December 1 and May 1 using procedures approved by the Executive Secretary and consistent with the procedures described in R307-342, UAC.

(2) During testing, each tank shall not sustain a pressure change of more than 750 Pascal (3 inches of H_2O) in five minutes when pressurized (by air or inert gas) to 4500 Pascal (18 inches of H_2O) or evacuated to 1500 Pascal (6 inches of H_2O).

(3) No visible liquid leaks are permitted during testing.

(4) Gasoline tank trucks shall be certified leak tight at least annually by a qualified contractor approved by the Executive Secretary. (origin: R307-328-7).

II.B.35.c.2 **Recordkeeping:**

(1) All gasoline tank truck operators shall have in their possession a valid vapor tightness certification for the tank truck they are operating, which:

(a) shows the date that the gasoline tank truck last passed the Utah vapor tightness certification test; and

(b) shows the identification number of the gasoline tank truck.

(2) Records of certification inspections, as well as any maintenance performed, shall be retained by the permittee for a five year period and be available for review by the Executive Secretary or his representative.

II.B.35.c.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.36 **Conditions on Melt Furnaces in Building 507 (Unit #42).**

II.B.36.a **Condition:**

Natural gas consumption from melt furnaces shall be no greater than 0.289 MMSCF per calendar year combined total for all melt furnaces. [Authority granted under R307-401-8(1)(a) [BACT]; condition originated in DAQE-AN0101210189-08].

II.B.36.a.1 **Monitoring:**

On a monthly basis, the permittee shall record the information needed to estimate natural gas consumption. By the 30th day of January, the annual natural gas consumption for the previous calendar year shall be calculated using the appropriate conversion of acf to scf, as recommended by the vendor.

II.B.36.a.2 **Recordkeeping:**

Records such as gas meters, hours of operation, metal throughput, and estimated average burner rate as a percent of design capacity can be used to determine natural gas consumption and shall be maintained as described in Provision I.S.1 of this permit.

II.B.36.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.37 **Conditions on IWTP- Air Stripper (Unit #48).**

II.B.37.a **Condition:**

Throughput of reactive VOCs shall be no greater than 12 tons per year. [Authority granted under R307-401-8(1) [BACT]; condition originated in Approval Order issued 2/20/86].

II.B.37.a.1 **Monitoring:**

Daily, when in operation, the permittee shall monitor the flow of wastewater through the air stripper tower. Once per quarter, wastewater samples shall be collected upstream and downstream of the tower and analyzed for VOC concentration in accordance with Method SW846-8260B. All wastewater samples shall be collected in accordance with the following standard collection protocol:

(1) Samples shall be collected in clean 40 ml vials with teflon seals
(2) Vial shall be inverted to avoid collecting any bubbles in the vial
(3) Vial shall be filled with minimum disturbance of the stream surface

By January 31st each year, VOC throughput shall be calculated for the prior calendar year based on the differential VOC concentration and wastewater throughput for each quarter. An annual VOC throughput shall be calculated by adding the quarterly VOC throughput.

Wastewater sampling for VOC shall not be required for those quarters in which the air stripper was not in operation. In such case, the quarterly VOC throughput shall be zero.

II.B.37.a.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.37.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.38 **Conditions on C130 Air Handlers (Unit #50).**

II.B.38.a **Condition:**

The combined consumption of natural gas in the affected emission units shall not exceed 450 MMcf per rolling 12-month period. [Authority granted under R307- 401-8(1) [BACT]; condition originated in DAQE-AN0121150-03].

II.B.38.a.1 **Monitoring:**

The combined consumption of natural gas shall be monitored with fuel meters on the heaters. By the 30th of each month (or the 28th for February), the permittee shall calculate a new rolling 12-month total using data from the previous 12 months.

II.B.38.a.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.38.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.39 **Conditions on Landfill Gas Fired Power Generation Facility (Unit #51).**

II.B.39.a **Condition:**

Visible emissions shall be no greater than 10 percent opacity. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN101210179-07].

II.B.39.a.1 **Monitoring:**

The permittee shall apply one of the following monitoring techniques to each affected emission unit:

A. An annual opacity determination performed by a certified VEO in accordance with 40 CFR 60, Appendix A, Method 9.

B. Quarterly photogrametric opacity observations conducted by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. The observer does not have to be a certified Method 9 observer. If an opacity of 10 percent or more is detected by the photogrametric analysis, an opacity determination of that emission point shall be performed a certified VEO in accordance with 40 CFR 60, Appendix A, Method 9 within 24 hours of the initial photogrametric opacity observation.

The monitoring option selected can vary from unit to unit. Also if quarterly photogrametric opacity observations are being conducted for a given unit and the permittee cannot conduct a photogrametric opacity observation in a quarter, an opacity determination conducted in accordance with the procedures of 40 CFR 60, Appendix A, Method 9 will satisfy the monitoring requirements of this condition.

II.B.39.a.2 **Recordkeeping:**

The permittee shall maintain a log of opacity determinations and/or photogrametric observations which includes the following information for each affected emission unit: the date and time of each photogrametric opacity observation and/or 40 CFR 60, Appendix A, Method 9 opacity determination, the specific monitoring technique used (Method 9 or photogrametric) and the result of the opacity monitoring. The records required by this provision and all data required by 40 CFR 60, Appendix A, Method 9 shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.39.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.39.b **Condition:**

Emissions of CO shall be no greater than 3.3 grams/bhp-hr from each of the 814 bhp and 1148 bhp lean burn engines. Emissions of CO shall be no greater than 2.5 grams/bhp-hr from the 1350 bhp lean burn engine. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN101210179-07].

II.B.39.b.1 **Monitoring:**

Stack testing shall be performed as specified below:

(a) Frequency. Initial compliance testing is required on each engine within 180 days of startup. Emissions shall then be tested every three years using a portable analyzer or every five years using methods noted below. If the source is suspected to be in violations with the emission limits stated in the permit, testing may be required.

(b) Notification. At least 30 days before the test, the permittee shall notify the Executive Secretary of the date, time, and place of testing and provide a copy of the test protocol. The

source shall attend a pretest conference if determined necessary by the Executive Secretary.

(c) Sample Location. The emission point shall be designed to conform to the requirements of 40 CFR 60, Appendix A, Method 1A, or other methods as approved by the Executive Secretary. An Occupational Safety and Health Administration (OSHA) or Mine Safety and Health Administration (MSHA) approved access shall be provided to the test location.

(d) Volumetric Flow Rate. 40 CFR 60, Appendix A, Method 2 or 40 CFR 60, Appendix A, Method 19.

(e) Carbon Monoxide (CO). 40 CFR 60, Appendix A, Method 10

(f) Calculations. To determine mass emission rates (grams/bhp-hr, etc.) the pollutant concentration as determined by the appropriate methods above shall be multiplied by the volumetric flow rate if using 40 CFR 60, Appendix A, Method 2 or using the appropriate equation in 40 CFR 60 Appendix A Method 19 and any necessary conversion factors determined by the Executive Secretary, to give the results in the specified units of the emission limitation.

II.B.39.b.2 **Recordkeeping:**

Results of all stack testing shall be recorded and maintained in accordance with the associated test method and Provision S.1 in Section I of this permit.

II.B.39.b.3 **Reporting:**

In addition to the reporting requirements of Section I of this permit, the permittee shall submit the results of the stack tests to the Executive Secretary within 60 days of completion of the testing. Results shall clearly identify test results as compared to permit limits and indicate compliance status.

II.B.39.c **Condition:**

Emissions of NO_x shall be no greater than 2 grams/bhp-hr from each of the 814 bhp and 1148 bhp lean burn engines. Emissions of NO_x shall be no greater than 1 grams/bhp-hr from the 1350 bhp lean burn engine. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN101210179-07].

II.B.39.c.1 **Monitoring:**

Stack testing shall be performed as specified below:

(a) Frequency. Initial compliance testing is required on each engine within 180 days of startup. Emissions shall then be tested every three years using a portable analyzer or every five years using methods noted below. If the source is suspected to be in violations with the emission limits stated in the permit, testing may be required.

(b) Notification. At least 30 days before the test, the permittee shall notify the Executive Secretary of the date, time, and place of testing and provide a copy of the test protocol. The source shall attend a pretest conference if determined necessary by the Executive Secretary.

(c) Sample Location. The emission point shall be designed to conform to the requirements of 40 CFR 60, Appendix A, Method 1A, or other methods as approved by the Executive Secretary. An Occupational Safety and Health Administration (OSHA) or Mine Safety and Health Administration (MSHA) approved access shall be provided to the test location.

(d) Volumetric Flow Rate. 40 CFR 60, Appendix A, Method 2 or 40 CFR 60, Appendix A, Method 19.

(e) Nitrogen Oxides (NO_x). 40 CFR 60, Appendix A, Method 7, 7A, 7B, 7C, 7D or 7E

(f) Calculations. To determine mass emission rates (grams/bhp-hr, etc.) the pollutant concentration as determined by the appropriate methods above shall be multiplied by the volumetric flow rate if using 40 CFR 60, Appendix A, Method 2 or using the appropriate equation in 40 CFR 60 Appendix A Method 19 and any necessary conversion factors determined by the Executive Secretary, to give the results in the specified units of the emission limitation.

II.B.39.c.2 **Recordkeeping:**

Results of all stack testing shall be recorded and maintained in accordance with the associated test method and Provision S.1 in Section I of this permit.

II.B.39.c.3 **Reporting:**

In addition to the reporting requirements of Section I of this permit, the permittee shall submit the results of the stack tests to the Executive Secretary within 60 days of completion of the testing. Results shall clearly identify test results as compared to permit limits and indicate compliance status.

II.B.39.d **Condition:**

Permittee shall ensure that 10 percent or more of the gross heat input to the affected emission units on an annual basis shall be from the combustion of landfill gas. In addition, the permittee shall operate the affected emission units in a manner that reasonably minimizes HAP emissions. [Authority granted under 40 CFR 63.6625(c); condition originated in 40 CFR 63 Subpart ZZZZ].

II.B.39.d.1 **Monitoring:**

The permittee shall monitor and record fuel usage daily with separate fuel meters to measure the volumetric flow rate of each fuel.

II.B.39.d.2 **Recordkeeping:**

The permittee shall keep records of daily fuel usage for each fuel type in accordance with Provision I.S.1 of this permit.

II.B.39.d.3 **Reporting:**

In addition to the reporting requirements specified in Section I of this permit, the permittee shall submit an annual report postmarked or delivered no later than January 31. The report shall contain the following data:

(1) Fuel flow rate of each fuel and the heating values that were used in calculations provided in this paragraph. The permittee shall demonstrate that the percentage of heat input provided by landfill gas is equivalent to 10 percent or more of the total fuel consumption on an annual basis.

(2) The operating limits provided in the federally enforceable permit, and any deviations from these limits.

(3) Any problems or errors suspected with the meters.

II.B.40 **Conditions on Aboveground JP-8 Fuel Storage Tanks (Unit #52).**

II.B.40.a **Condition:**

Combined throughput of JP-8 in the 275,000 gallon fuel storage tank shall be no greater than 36,000,000 gallons per rolling 12-month period for the affected emission unit. [Authority granted under R307- 401- 8(1)(a) (BACT); condition originated in DAQE-AN0101210191-08].

II.B.40.a.1 **Monitoring:**

By the 30th day (28th for February) of each month, a rolling 12-month total of JP-8 throughput shall be determined using records from the previous 12 months.

II.B.40.a.2 **Recordkeeping:**

Records required for this permit condition shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.40.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.40.b **Condition:**

Throughput of JP-8 in the 1,070,764 gallon, 2,320,209 gallon, 366,063 gallon, and 550,400 gallon fuel storage tanks shall be no greater than 52,920,000 gallons per rolling 12-month period for the affected emission unit. [Authority granted under R307- 401- 8(1)(a) (BACT); condition originated in DAQE-AN0101210187-08].

II.B.40.b.1 **Monitoring:**

By the 30th day (28th for February) of each month, a rolling 12-month total of JP-8 throughput shall be determined using records from the previous 12 months.

II.B.40.b.2 **Recordkeeping:**

Records required for this permit condition shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.40.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.41 **Conditions on Plasma Cutting Booth and Baghouse in Building 507 (Unit #53).**

II.B.41.a **Condition:**

Visible emissions shall be no greater than 10 percent opacity. [Authority granted under R307-401-8(1) [BACT]; condition originated in DAQE-AN0121160-04].

II.B.41.a.1 **Monitoring:**

A visual opacity survey of each affected emission unit shall be performed on a monthly basis by an individual trained on the observation procedures of 40 CFR 60, Appendix A, Method 9. If visible emissions other than steam are observed from an emission unit, an opacity determination of that emission unit shall be performed by a certified observer within 24 hours of the initial survey. The opacity determination shall be performed in accordance with 40 CFR 60, Appendix A, Method 9.

II.B.41.a.2 **Recordkeeping:**

The permittee shall record the date of each visual opacity survey and keep a list of the emission points checked during the visual opacity survey. The permittee shall maintain all the records required by this provision and all data required by 40 CFR 60, Appendix A, Method 9 in accordance with Provision I.S.1 of this permit.

II.B.41.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.42 **Conditions on NSPS Compression Ignition Internal Combustion Engines (CI ICE) (Unit #55).**

II.B.42.a **Condition:**

The permittee shall operate and maintain affected emission units that achieve the emission standards as required in 40 CFR 60.4205 according to the manufacturer's written instructions or procedures developed by the permittee that are approved by the engine manufacturer, over the entire life of the engine. In addition, the permittee may only change those settings that are permitted by the manufacturer. The permittee shall also meet the requirements of 40 CFR parts 89, 94 and/or 1068, as they apply to permittee. [Authority granted under 40 CFR 63, subpart ZZZZ, 40 CFR 60.4206 and 40 CFR 60.4211(a); condition originated in 40 CFR 60 Subpart IIII].

II.B.42.a.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.42.a.2 **Recordkeeping:**

Permittee shall document activities performed to assure proper operation and maintenance. Records shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.42.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.42.b **Condition:**

Sulfur content of any diesel fuel combusted shall be no greater than 500 ppm (0.05 percent by weight) and beginning October 1, 2010, sulfur content of any diesel fuel combusted in an affected emission unit with a displacement of less than 30 liters per cylinder shall be no greater than 15 ppm (0.0015 percent by weight). [Authority granted under 40 CFR 63, subpart ZZZZ and 40 CFR 60.4207; condition originated in 40 CFR 60 Subpart IIII].

II.B.42.b.1 **Monitoring:**

For each delivery of diesel fuel, the permittee shall either:

(1) Determine the fuel sulfur content expressed as wt% in accordance with the methods of the American Society for Testing Materials (ASTM); or

(2) Inspect the fuel sulfur content expressed as wt% determined by the vendor using methods of the ASTM; or

(3) Inspect documentation provided by the vendor that demonstrates compliance with this provision (directly or indirectly).
.

II.B.42.b.2 **Recordkeeping:**

For each fuel load received, the permittee shall maintain either fuel receipt records showing sulfur content of the delivered fuel or records of all sulfur content testing performed on the delivered fuel. These records shall be maintained in accordance with Provision I.S.1. of this permit.

II.B.42.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.42.c **Condition:**

Each affected emission unit shall not exceed 100 hours of maintenance checks and readiness testing per year unless the permittee maintains records indicating that Federal, State, or local standards require maintenance and testing of affected emission units beyond 100 hours per year. [Authority granted under 40 CFR 63, subpart ZZZZ and 40 CFR 60.4211(e); condition originated in 40 CFR 40 CFR 60 Subpart IIII].

II.B.42.c.1 **Monitoring:**

The permittee shall install a non-resettable hour meter prior to startup of affected emission units. Hours of operation shall be monitored using the non-resettable hour meter (origin: 40 CFR 60.4209(a)).

II.B.42.c.2 **Recordkeeping:**

Records of monitoring of each affected emission unit shall be kept on a monthly basis in an operation and maintenance log. Records shall distinguish between maintenance-related hours and emergency use-related hours. If maintenance and testing beyond 100 hours per year are required by Federal, State, or local standards, records of these standards shall also be kept.

Starting with the model years in Table 5 of 40 CFR 60 Subpart IIII, if an affected emission unit does not meet the standards applicable to non-emergency engines in the applicable model year, the permittee shall keep records of the operation of the engine in emergency and non-emergency service that are recorded through the non-resettable hour meter. The permittee must record the time of operation of the engine and the reason the engine was in operation during that time. (Origin: 40 CFR 60.4214(b))

Records shall be maintained as described in Provision I.S.1 of this permit.

II.B.42.c.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.43 **Conditions on NSPS CI ICE Emergency Non Fire Pump Engines (CI ICE) (Unit #56).**

II.B.43.a **Condition:**

For all affected emission units, except those that are modified, reconstructed, or removed from one existing location and reinstalled at a new location, the permittee shall comply with paragraphs (a) through (c).
(a) After December 31, 2008, the permittee shall not install affected emission units that do not meet the applicable requirements for 2007 model year engines.
(b) After December 31, 2009, the permittee shall not install affected emission units with a maximum engine power of less than 19 KW (25 HP) that do not meet the applicable requirements for 2008 model year engines.
(c) The permittee shall not import affected emission units with a displacement of less than 30 liters per cylinder that do not meet the applicable requirements specified in paragraphs (a) and (b) of this section after the dates specified in paragraphs (a) and (b) of this section. [Authority granted under 40 CFR 63, subpart ZZZZ and 40 CFR 60.4208; condition originated in 40 CFR 60 Subpart IIII].

II.B.43.a.1 **Monitoring:**

Records required for this permit condition will serve as monitoring.

II.B.43.a.2 **Recordkeeping:**

The permittee shall keep records of the install date of each affected emission unit and the applicable requirements under 40 CFR 60 Subpart IIII. Records shall be maintained as described in Provision I.S.1 of this permit.

II.B.43.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.43.b **Condition:**

Pre-2007 model year affected emission units with a displacement of less than 10 liters per cylinder shall comply with the emission standards in Table 1 of 40 CFR 60 Subpart IIII. Pre-2007 model year affected emission units with a displacement of greater than or equal to 10 liters per cylinder and less than 30 liters per cylinder shall comply with the emission standards in 40 CFR 94.8(a)(1). [Authority granted under 40 CFR 63, subpart ZZZZ and 40 CFR 60.4205(a); condition originated in 40 CFR 60 Subpart IIII].

II.B.43.b.1 **Monitoring:**

The permittee shall demonstrate compliance according to one of the methods specified in paragraphs (1) through (5) of this section.
(1) Purchasing an engine certified according to 40 CFR part 89 or 40 CFR part 94, as applicable, for the same model year and maximum engine power. The engine must be installed and configured according to the manufacturer's specifications.
(2) Keeping records of performance test results for each pollutant for a test conducted on a similar engine. The test must have been conducted using the same methods specified in 40 CFR 60 Subpart IIII and these methods must have been followed correctly.
(3) Keeping records of engine manufacturer data indicating compliance with the standards.
(4) Keeping records of control device vendor data indicating compliance with the standards.
(5) Conducting an initial performance test to demonstrate compliance with the emission standards according to the requirements specified in 40 CFR 60.4212, as applicable. (Origin: 40 CFR 60.4211(b))
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II.B.43.b.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.43.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.43.c **Condition:**

2007 model year and later affected emission units with a displacement of less than 30 liters per cylinder shall comply with the emission standards for new nonroad CI ICE in 40 CFR 60.4202, for all pollutants, for the same model year and maximum engine power for their 2007 model year and later emergency stationary CI ICE. [Authority granted under 40 CFR 63, subpart ZZZZ and 40 CFR 60.4205(b); condition originated in 40 CFR 60 Subpart IIII].

II.B.43.c.1 **Monitoring:**

The permittee shall comply by purchasing an engine certified to the emission standards in 40 CFR 60.4205(b) for the same model year and maximum (or in the case of fire pumps, NFPA nameplate) engine power. The engine must be installed and configured according to the manufacturer's specifications. (Origin: 40 CFR 60.4211(c)).

II.B.43.c.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.43.c.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.44 **Conditions on NSPS CI ICE Emergency Fire Pump Engines (CI ICE) (Unit #57).**

II.B.44.a **Condition:**

Affected emission units with a displacement of less than 30 liters per cylinder shall comply with the emission standards in Table 4 of 40 CFR 60 Subpart IIII, for all pollutants. [Authority granted under 40 CFR 63, subpart ZZZZ and 40 CFR 60.4205(c); condition originated in 40 CFR 60 Subpart IIII].

II.B.44.a.1 **Monitoring:**

(a) For affected emission units that are manufactured prior to the model years in Table 3 of 40 CFR 60 Subpart IIII, the permittee shall demonstrate compliance according to one of the methods specified in paragraphs (a)(1) through (5) of this section.

(1) Purchasing an engine certified according to 40 CFR part 89 or 40 CFR part 94, as applicable, for the same model year and maximum engine power. The engine must be installed and configured according to the manufacturer's specifications.

(2) Keeping records of performance test results for each pollutant for a test conducted on a similar engine. The test must have been conducted using the same methods specified in 40 CFR 60 Subpart IIII and these methods must have been followed correctly.

(3) Keeping records of engine manufacturer data indicating compliance with the standards.

(4) Keeping records of control device vendor data indicating compliance with the standards.

(5) Conducting an initial performance test to demonstrate compliance with the emission standards according to the requirements specified in 40 CFR 60.4212, as applicable. (Origin: 40 CFR 60.4211(b))

(b) For affected emission units that are manufactured during or after the applicable model years for fire pump engine power rating in Table 3 of 40 CFR 60 Subpart IIII, the permittee shall comply by purchasing an engine certified to the emission standards in 40 CFR 60.4205(c) for the same model year and maximum (or in the case of fire pumps, NFPA nameplate) engine power. The engine must be installed and configured according to the manufacturer's specifications. (Origin: 40 CFR 60.4211(c)).

II.B.44.a.2 **Recordkeeping:**

Results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.44.a.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.45 **Conditions on NSPS Spark Ignition Internal Combustion Engines (SI ICE) (Unit #58).**

II.B.45.a **Condition:**

(a) For each affected emission unit where construction commenced (i.e., date the affected emission unit is ordered by the Permittee) after June 12, 2006, with a maximum engine power:

(1) Less than or equal to 19 KW (25 HP) manufactured on or after July 1, 2008, the Permittee shall comply with the emission standards in 40 CFR 60.4231(a) (origin 40 CFR 60.4233(a));

(2) Greater than 19 KW (25 HP) manufactured on or after January 1, 2009 that use gasoline, the Permittee shall comply with the emission standards in 40 CFR 60.4231(b) (origin 40 CFR 60.4233(b));

(3) Greater than 19 KW (25 HP) manufactured on or after January 1, 2009 that are rich burn engines that use LPG, the Permittee shall comply with the emission standards in 40 CFR 60.4231(c) (origin 40 CFR 60.4233(c));

(4) Greater than 19 KW (25 HP) and less than 75 KW (100 HP) (except gasoline and rich burn engines that use LPG) the Permittee shall comply with the emission standards in Table 1 of 40 CFR 60 Subpart JJJJ (origin 40 CFR 60.4233(d)); or

(5) Greater than or equal to 75 KW (100 HP) (except gasoline and rich burn engines that use LPG), the Permittee shall comply with the emission standards in Table 1 of 40 CFR 60 Subpart JJJJ. Alternatively for engines manufactured prior to January 1, 2011 that were certified to the certification emission standards in 40 CFR part 1048 applicable to engines that are not severe duty engines, if such stationary SI ICE was certified to a carbon monoxide (CO) standard above the standard in Table 1 40 CFR 60 Subpart JJJJ, the Permittee may meet the CO certification (not field testing) standard for which the engine was certified. (origin 40 CFR 60.4233(e))

(b) For each affected emission unit that commenced modification or reconstruction after June 12, 2006 with a maximum engine power:

(1) Less than or equal to 19 KW (25 HP), the Permittee shall comply with the same emission standards as those specified in paragraph (a)(1) of this condition (origin 40 CFR 60.4233(f)(1));

(2) Greater than 19 KW (25 HP) that use gasoline, the Permittee shall comply with the same emission standards as those specified in paragraph (a)(2) of this condition (origin 40 CFR 60.4233(f)(2));

(3) Greater than 19 KW (25 HP) that are rich burn engines that use LPG, the Permittee shall comply with the same emission standards as those specified in paragraph (a)(3) of this condition (origin 40 CFR 60.4233(f)(3)); or

(4) Greater than 19 KW (25 HP) for SI natural gas and lean burn LPG, the Permittee shall comply with the same emission standards as those specified in paragraph (a)(4) or (5) of this condition, except that engines greater than or equal to 130 HP shall meet a nitrogen oxides (NOX) emission standard of 3.0 grams per HP-hour (g/HP-hr), a CO emission standard of 4.0 g/HP-hr, and a volatile organic compounds (VOC) emission standard of 1.0 g/HP-hr, or a NOX emission standard of 250 ppmvd at 15 percent oxygen (O_2), a CO emission standard 540 ppmvd at 15 percent O_2, and a VOC emission standard of 86 ppmvd at 15 percent O_2, where the date of manufacture of the engine is prior to January 1, 2009. (origin 40 CFR 60.4233(f)(4)).

(c) Deadline for importing or installing affected emission units produced in the previous model year

(1) After July 1, 2010, the Permittee shall not install affected emission units with a maximum engine power of less than or equal to 25 HP that do not meet the applicable requirements in sections (a) and (b) of this condition. (origin 40 CFR 60.4236 (a))

(2) For affected emission units with a maximum engine power of greater than 19 KW (25 HP), the Permittee shall not install engines that do not meet the applicable requirements in sections (a) and (b) of this condition after January 1, 2011. (origin 40 CFR 60.4236 (c))

(3) In addition to the requirements specified in 40 CFR 60.4231 and sections (a) and (b) of this condition, it is prohibited to import affected emission units less than or equal to 19 KW (25 HP),

stationary rich burn LPG affected emission units, and stationary gasoline affected emission units that do not meet the applicable requirements specified in paragraphs (1), and (2) of section (c) of this condition, after the date specified in paragraph (1), and (2) of section (c) of this condition. (origin 40 CFR 60.4236 (d))

(4) The requirements of section (c) of this condition do not apply to affected emission units that have been modified or reconstructed, and they do not apply to affected emission units that were removed from one existing location and reinstalled at a new location. (origin 40 CFR 60.4236 (e))

(d) The Permittee shall operate and maintain affected emission units that achieve the emission standards as required in this condition over the entire life of the engine (origin 40 CFR 60.4234)

(e) The air-to-fuel ratio (AFR) controller, if used, shall be maintained and operated appropriately by the Permittee in order to ensure proper operation of affected emission units and control device to minimize emissions at all times. (origin 40 CFR 60.4243(g))

[Authority granted under 40 CFR 63, subpart ZZZZ, 40 CFR 60.4233, 60.4234, 60.4236, and 60.4243; condition originated in 40 CFR 60 Subpart JJJJ]

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II.B.45.a.1 **Monitoring:**

(a) For affected emission units subject to (a)(1) through (3) of this condition, the Permittee shall comply by purchasing an engine certified to the emission standards in 40 CFR 60.4231(a) through (c), as applicable, for the same engine class and maximum engine power. The Permittee shall also meet the requirements as specified in 40 CFR part 1068, subparts A through D, as they apply. If the Permittee adjusts engine settings according to and consistent with the manufacturer's instructions, the affected emission unit will not be considered out of compliance. In addition, the Permittee shall meet one of the requirements specified in (a)(1) and (2) of this section.

(1) If the Permittee operates and maintains the certified stationary SI internal combustion engine and control device according to the manufacturer's emission-related written instructions, the Permittee shall keep records of conducted maintenance to demonstrate compliance, but no performance testing is required for the Permittee.

(2) If the Permittee does not operate and maintain the certified stationary SI internal combustion engine and control device according to the manufacturer's emission-related written instructions, the engine will be considered a non-certified engine, and the Permittee shall demonstrate compliance according to (a)(2)(i) through (iii) of this section, as appropriate.

(i) If the affected emission unit is less than 100 HP, the Permittee shall keep a maintenance plan and records of conducted maintenance to demonstrate compliance and shall, to the extent practicable, maintain and operate the engine in a manner consistent with good air pollution control practice for minimizing emissions, but no performance testing is required for the Permittee.

(ii) If the affected emission unit is greater than or equal to 100 HP and less than or equal to 500 HP, the Permittee shall keep a maintenance plan and records of conducted maintenance and shall, to the extent practicable, maintain and operate the engine in a manner consistent with good air pollution control practice for minimizing emissions. In addition, the Permittee shall conduct an initial performance test within 1 year of engine startup to demonstrate compliance.

(iii) If the affected emission unit is greater than 500 HP, the Permittee shall keep a maintenance plan and records of conducted maintenance and shall, to the extent practicable, maintain and operate the engine in a manner consistent with good air pollution control practice for minimizing emissions. In addition, the Permittee shall conduct an initial performance test within 1 year of engine startup and conduct subsequent performance testing every 8,760 hours or 3 years, whichever comes first, thereafter to demonstrate compliance. (Origin: 40 CFR 60.4243(a)).

(b) For affected emission units subject to (a)(4) or (5) of this condition, the Permittee shall

demonstrate compliance according to one of the methods specified in paragraphs (b)(1) and (2) of this section.

(1) Purchasing an engine certified according to procedures specified in this condition, for the same model year and demonstrating compliance according to one of the methods specified in paragraph (a) of this section.

(2) Purchasing a non-certified engine and demonstrating compliance with the emission standards specified in (a)(4) or (5) of this condition and according to the requirements specified in 40 CFR 60.4244, as applicable, and according to paragraphs (b)(2)(i) and (ii) of this section.

(i) If the affected emission unit is greater than 25 HP and less than or equal to 500 HP, the Permittee shall keep a maintenance plan and records of conducted maintenance and shall, to the extent practicable, maintain and operate the engine in a manner consistent with good air pollution control practice for minimizing emissions. In addition, the Permittee shall conduct an initial performance test to demonstrate compliance.

(ii) If the affected emission unit is greater than 500 HP, the Permittee shall keep a maintenance plan and records of conducted maintenance and shall, to the extent practicable, maintain and operate the engine in a manner consistent with good air pollution control practice for minimizing emissions. In addition, the Permittee shall conduct an initial performance test and conduct subsequent performance testing every 8,760 hours or 3 years, whichever comes first, thereafter to demonstrate compliance. (Origin: 40 CFR 60.4243(b))

(c) For affected emission units subject to (b) of this condition, the Permittee shall demonstrate compliance according to paragraph (b)(2)(i) or (ii) of this section, except that if the Permittee complies according to paragraph (b)(2)(i) of this section, the Permittee demonstrates that the non-certified engine complies with the emission standards specified in section (b) of this condition. (Origin: 40 CFR 60.4243(c))

(d) For affected emission units less than or equal to 500 HP and the Permittee purchases a non-certified engine or the Permittee does not operate and maintain the affected emission unit and control device according to the manufacturer's written emission-related instructions, the Permittee is required to perform initial performance testing as indicated in this section, but the Permittee is not required to conduct subsequent performance testing unless the stationary engine is rebuilt or undergoes major repair or maintenance. A rebuilt stationary SI ICE means an engine that has been rebuilt as that term is defined in 40 CFR 94.11(a). (Origin: 40 CFR 60.4243(f))

(e) The Permittee shall conduct performance tests in accordance with the procedures in 40 CFR 60.4244(a) through (f). (Origin: 40 CFR 60.4244)

(f) Permittee of stationary SI ICE that are required to meet standards that reference 40 CFR 1048.101 shall, if testing their engines in use, meet the standards in that section applicable to field testing, except as indicated in paragraph (a)(5) of this condition. (Origin: 40 CFR 60.4233(h)).

II.B.45.a.2 **Recordkeeping:**

(a) For the affected emission unit, the Permittee shall keep records of the information in paragraphs (a)(1) through (4) of this section.

(1) All notifications submitted to comply with this condition and all documentation supporting any notification.

(2) Maintenance conducted on each affected emission unit.

(3) If the affected emission unit is a certified engine, documentation from the manufacturer that the affected emission unit is certified to meet the emission standards and information as required in 40 CFR parts 90 and 1048.

(4) If the affected emission unit is not a certified engine or is a certified engine operating in a non-certified manner and subject to section (a)(2) of monitoring, documentation that the engine meets the emission standards. (Origin: 40 CFR 60.4245(a))

(b) Records in section (a) and results of monitoring shall be maintained in accordance with Provision I.S.1 of this permit.

II.B.45.a.3 **Reporting:**

In addition to the reporting requirements specified in Section I of this permit, the permittee shall submit the following notifications and reports.
(a) For affected emission units greater than or equal to 500 HP that have not been certified by an engine manufacturer to meet the emission standards in 40 CFR 60.4231, the Permittee shall submit an initial notification as required in 40 CFR 60.7(a)(1). The notification shall include the information in paragraphs (a)(1) through (5) of this section.

(1) Name and address of the Permittee;

(2) The address of the affected emission unit;

(3) Engine information including make, model, engine family, serial number, model year, maximum engine power, and engine displacement;

(4) Emission control equipment; and

(5) Fuel used. (Origin: 40 CFR 60.4245(c))

(b) For affected emission units that are subject to performance testing, the Permittee shall submit a copy of each performance test as conducted in 40 CFR 60.4244 within 60 days after the test has been completed. (Origin: 40 CFR 60.4245(b)).

II.B.45.b **Condition:**

(a) Affected emission units may be operated for the purpose of maintenance checks and readiness testing, provided that the tests are recommended by Federal, State or local government, the manufacturer, the vendor, or the insurance company associated with the engine. Maintenance checks and readiness testing of such units is limited to 100 hours per year. There is no time limit on the use of affected emission units in emergency situations. The Permittee may petition the Executive Secretary for approval of additional hours to be used for maintenance checks and readiness testing, but a petition is not required if the Permittee maintains records indicating that Federal, State, or local standards require maintenance and testing of emergency ICE beyond 100 hours per year. Affected emission units may operate up to 50 hours per year in non-emergency situations, but those 50 hours are counted towards the 100 hours per year provided for maintenance and testing. The 50 hours per year for non-emergency situations cannot be used for peak shaving or to generate income for a facility to supply power to an electric grid or otherwise supply power as part of a financial arrangement with another entity. For affected emission units, any operation other than emergency operation, maintenance and testing, and operation in non-emergency situations for 50 hours per year, as permitted in this section, is prohibited.
(b) The Permittee may operate affected emission units using propane for a maximum of 100 hours per year as an alternative fuel solely during emergency operations, but the Permittee shall keep records of such use. If propane is used for more than 100 hours per year in an affected emission unit that is not certified to the emission standards when using propane, the Permittee is required to conduct a performance test to demonstrate compliance with the emission standards of 40 CFR 60.4233.
[Authority granted under 40 CFR 63, subpart ZZZZ, 40 CFR 60.4243(d) and (e); condition originated in 40 CFR 60 Subpart JJJJ].

II.B.45.b.1 **Monitoring:**

(a) Starting on July 1, 2010, for each affected emission unit that is greater than or equal to 500 HP that was built on or after July 1, 2010, that does not meet the standards applicable to non-emergency engines, the Permittee shall install a non-resettable hour meter. (Origin: 40 CFR 60.4237(a))
(b) Starting on January 1, 2011, for each affected emission unit that is greater than or equal to 130 HP and less than 500 HP that was built on or after January 1, 2011, that does not meet the standards applicable to non-emergency engines, the Permittee shall install a non-resettable hour meter. (Origin: 40 CFR 60.4237(b))
(c) For affected emission units less than 130 HP, built on or after July 1, 2008, and does not meet the standards applicable to non-emergency engines, the Permittee shall install a non-resettable hour meter upon startup of the affected emission unit. (Origin: 40 CFR 60.4237(c).

II.B.45.b.2 **Recordkeeping:**

For each affected emission unit:
(a) greater than or equal to 500 HP manufactured on or after July 1, 2010, that do not meet the standards applicable to non-emergency engines, the Permittee shall keep records of the hours of operation of the affected emission unit that is recorded through the non-resettable hour meter; or
(b) greater than or equal to 130 HP and less than 500 HP manufactured on or after July 1, 2011 that do not meet the standards applicable to non-emergency engines, the Permittee shall keep records of the hours of operation of the affected emission unit that is recorded through the non-resettable hour meter; or
(c) greater than 25 HP and less than 130 HP manufactured on or after July 1, 2008, that do not meet the standards applicable to non-emergency engines, the Permittee shall keep records of the hours of operation of the affected emission unit that is recorded through the non-resettable hour meter.
The Permittee shall document how many hours are spent for emergency operation, including what classified the operation as emergency and how many hours are spent for non-emergency operation. (Origin: 40 CFR 60.4245(b)

Records shall be maintained as described in Provision I.S.1 of this permit.

II.B.45.b.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.B.45.c **Condition:**

The permittee shall use gasoline that meets the per gallon sulfur limit in 40 CFR 80.195. [Authority granted under 40 CFR 63, subpart ZZZZ and 40 CFR 60.4235; condition originated in 40 CFR 60 Subpart JJJJ].

II.B.45.c.1 **Monitoring:**

For each delivery of gasoline, the permittee shall either:

(1) Determine the fuel sulfur content expressed as ppm; or

(2) Inspect the fuel sulfur content expressed as ppm determined by the vendor using methods of the ASTM; or

(3) Inspect documentation provided by the vendor that indirectly demonstrates compliance with this provision.
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II.B.45.c.2 **Recordkeeping:**

Records shall be maintained as described in Provision I.S.1 of this permit.

II.B.45.c.3 **Reporting:**

There are no reporting requirements for this provision except those specified in Section I of this permit.

II.C **Emissions Trading**
(R307-415-6a(10))

Not applicable to this source.

II.D **Alternative Operating Scenarios**.
(R307-415-6a(9))

Not applicable to this source.

There are no source-specific definitions for this permittee.

II.E Source-specific Definitions.

SECTION III: PERMIT SHIELD

A permit shield was not granted for any specific requirements.

REVIEWER COMMENTS

This operating permit incorporates all applicable requirements contained in the following documents:

Incorporates	DAQE-AN0101210191-08 dated November 19, 2008
Incorporates	DAQE-AN0101210190-08 dated August 13, 2008
Incorporates	DAQE-AN0101210189-08 dated April 3, 2008
Incorporates	DAQE-AN0101210186-08 dated March 17, 2008
Incorporates	DAQE-AN0101210187-08 dated March 14, 2008
Incorporates	DAQE-AN0101210184-07 dated December 21, 2007
Incorporates	DAQE-AN0101210182-07 dated August 21, 2007
Incorporates	DAQE-AN101210181-07 dated March 23, 2007
Incorporates	DAQE-AN101210179-07 dated January 31, 2007
Incorporates	DAQE-AN0121174-06 dated October 23, 2006
Incorporates	DAQE-AN0121175-06 dated October 16, 2006
Incorporates	DAQE-AN0121173-05 dated September 2, 2005
Incorporates	DAQE-AN0121172-05 dated May 5, 2005
Incorporates	DAQE-AN0121171-05 dated March 15, 2005
Incorporates	DAQE-AN0121168-04 dated August 23, 2004
Incorporates	DAQE-AN0121167-04 dated August 20, 2004
Incorporates	DAQE-AN0121162-04 dated May 10, 2004
Incorporates	DAQE-AN0121160-04 dated February 19, 2004
Incorporates	DAQE-AN0121159-04 dated January 15, 2004
Incorporates	DAQE-AN0121150-03 dated May 9, 2003
Incorporates	DAQE-210-02 dated March 18, 2002
Incorporates	DAQE-130-01 dated February 21, 2001
Incorporates	DAQE-1098-97 dated November 20, 1997
Incorporates	BAQE-669-88 dated December 20, 1988
Incorporates	DAQE-353-88 dated July 21, 1988
Incorporates	Approval Order dated February 20, 1986
Incorporates	Approval Order dated July 12, 1979
Incorporates	Approval Order dated February 15, 1978

2. Comment on an item originating in 40 CFR 63, subpart ZZZZ regarding Permitted Source
   Applicability of 40 CFR 63, subpart ZZZZ: The permittee shall meet the requirements of 40 CFR 63, subpart ZZZZ by meeting the requirements of 40 CFR 60, subpart IIII for compression ignition engines and 40 CFR 60, subpart JJJJ, for spark ignition engines. [Last updated February 18, 2009]

4. Comment on an item originating in 40 CFR 64 regarding Permitted Source
   CAM has been evaluated for this source: There are no CAM conditons in this Title V permit [Last updated February 18, 2009]

6. Comment on an item originating in 40 CFR 60.42c(d) regarding Permitted Source
   Condition II.B.33.a NSPS Boilers (Unit # 37), II.B.9.b Limited Use Power Supply Units (Unit # 11), and II.B.42.b NSPS CI ICE (Unit #54): For each delivery of fuel oil or diesel, the permittee shall inspect documentation provided by the vendor that demonstrates compliance with the provision: Hill AFB has contracted fuel supplies with specifications for sulfur content in accordance with 40 CFR 60.42.c(d) and therefore the contract serves as recordkeeping for monitoring required for this condition. [Last updated February 18,

2009]

8. Comment on an item originating in 40 CFR 63 Subpart ZZZZ regarding Permitted Source
Mobile Source Excluded from Title V: The Hill AFB Title V permit only applies to stationary sources. As defined in 40 CFR 63 Subpart ZZZZ, "A stationary RICE is any internal combustion engine which uses reciprocating motion to convert heat energy into mechanical work and which is not mobile. Stationary RICE differs from mobile RICE in that stationary RICE is not a non-road engine as defined at 40 CFR 1068.30, and is not used to propel a motor vehicle or a vehicle used solely for competition." 40 CFR 1068.30 specifies that portable engines that remain at a location for more than 12 consecutive months would also be included under the definition of stationary RICE. Based on this definition, aerospace ground equipment (AGE) and generators used in field training exercises would not be considered stationary and are not subject to the Title V permit. [Comment last updated on 2/02/2005] [Last updated February 18, 2009]

10. Comment on an item originating in R307-201-3(5) regarding Permitted Source
More stringent 20 percent opacity limit on all (pre- 1973) diesel internal combustion units: Hill AFB has voluntarily accepted a more stringent 20 percent opacity limit on all (pre-1973) diesel internal combustion units at the base. Since Hill AFB has both pre and post 1973 engines, it is easier for them to only have one requirement to monitor for all the engines. [Comment last updated on 10/08/2002] [Last updated February 18, 2009]

12. Comment on an item originating in R307-201-3 regarding Permitted Source
Opacity monitoring frequency: The monthly monitoring frequency required by source-wide conditions II.B.1.e and II.B.1.f has been revised to quarterly. A reduction in the frequency is supported by almost two years of data that suggest most of Hill AFB's sources operate with no visible emissions and a monthly frequency is not required to certify compliance. [Comment last updated on 4/05/2005] [Last updated February 18, 2009]

14. Comment on an item originating in R307-307-1 regarding Permitted Source
Salting and Sanding Requirements: R307-307 requires that any person who applies salt, crushed slag or sand to roads in Davis County shall maintain records of material applied. It also requires the salt to be at least 92% sodium chloride (NaCl) unless they vacuum sweep every arterial roadway within three days of the end of the storm. Since Hill AFB does not salt or sand any roadways that meet the definition of arterial as shown on the Urbanized Area Map specified in the rule, they are not subject to the 92% limit. Records of salt and sand quantity and percent by weight are not to be used for determining compliance because R307-307-1 has no limit on the quantity applied or specification of the percent by weight. Hill AFB must comply with R307-307-1 by maintaining a Fugitive Dust Control Plan in accordance with R307-309-1 (Davis County portion of the Main Base) and R307-205-3 (Weber County portion of the Main Base) with strategies to control road fugitive dust. [Last updated February 18, 2009]

16. Comment on an item originating in R-307-203-1(1) regarding Permitted Source
Sulfur content of fuel oil combusted: Sulfur content of any fuel oil combusted shall be less than 0.85 pounds sulfur per MMBTU gross heat input. For each delivery of oil the permittee shall inspect documentation provided by the vendor that demonstrates compliance with the provision. Hill AFB has contracted fuel supplies with specifications for sulfur content in accordance with R-307-203-1 and therefore the contract serves as recordkeeping for monitoring required for this condition. [Last updated February 18, 2009]

18. Comment on an item originating in DAQE-130-01 regarding Permitted Source
Training requirements in DAQE-130-01: All personnel must be properly trained in order to meet the monitoring, recordkeeping and reporting requirements of this permit.

Adherence to all the conditions of this permit shall demonstrate compliance with this requirement, therefore, this condition is subsumed under the permittee's responsibility to comply to all the conditions of this permit. [Comment last updated on 4/06/2005] [Last updated February 18, 2009]

20. Comment on an item originating in 40 CFR 63.746(b) regarding Abrasive Blasting Subject to Aerospace NESHAP

Applicability of Aerospace NESHAP Requirements in Title V: The requirements of Condition II.B.3.b do not apply to the following:
(i) Regulated activities associated with the rework of antique aerospace vehicles or components;
(ii) Depainting of parts or units normally removed from the aerospace vehicle for depainting. However, depainting of wings and stabilizers is always subject to the requirements of this section regardless of whether their removal is considered by the owner or operator to be normal practice for depainting;
(iii) Aerospace vehicles or components that are intended for public display, no longer operational, and not easily capable of being moved;
(iv) Depainting of radomes;
(v) Depainting of parts, subassemblies, and assemblies normally removed from the primary aircraft structure before depainting; and
(vi) mechanical and hand sanding operations. [Last updated February 18, 2009]

22. Comment on an item originating in DAQE-AN0121167-04 and R307-206-4 regarding Abrasive Blasting not Subject to Aerospace NESHAP

R307-206 rule revisions in 2007 will require a change to the pre-approved BACT in DAQE-AN0121167-04.: Conditions will reference the most stringent requirements found in DAQE-AN0121167-04 which are more stringent than current requirements in R307-206-4 until such time that DAQE-AN0121167-04 is updated with R307-206-4 language for Visible Emission Standards [Last updated February 18, 2009]

24. Comment on an item originating in 40 CFR 63.744 regarding Aerospace NESHAP Chemical Cleaning

Applicability of Aerospace NESHAP Requirements in Title V: The requirements under the Aerospace NESHAP Chemical Cleaning (Conditon II.B.25) emission unit do no apply to the following:

(1) Regulated activities associated with space vehicles designed to travel beyond the limit of the earth's atmosphere, including but not limited to satellites, space stations, and the Space Shuttle System (including orbiter, external tanks, and solid rocket boosters);

(2) Regulated activities associated with the rework of antique aerospace vehicles or components; and

(3) Cleaning solvents containing HAP and VOC at concentrations less than 0.1 percent for carcinogens or 1.0 percent for noncarcinogens, as determined from manufacturer's representations. [Last updated February 18, 2009]

26. Comment on an item originating in 40 CFR 63.746(b) regarding Aerospace NESHAP Chemical Depainting

Applicability of Aerospace NESHAP Requirements in Title V: The requirements under the Aerospace NESHAP Chemical Depainting (Condition II.B.27) emission unit do no apply to the following:

(1) Regulated activities associated with the rework of antique aerospace vehicles or

components;

(2) Chemical strippers containing HAP and VOC at concentrations less than 0.1 percent for carcinogens or 1.0 percent for noncarcinogens, as determined from manufacturer's representations;

(3) Depainting of parts or units normally removed from the aerospace vehicle for depainting. However, depainting of wings and stabilizers is always subject to the requirements of this section regardless of whether their removal is considered by the owner or operator to be normal practice for depainting;

(4) Aerospace vehicles or components that are intended for public display, no longer operational, and not easily capable of being moved;

(5) Depainting of radomes; and

(6) Depainting of parts, subassemblies, and assemblies normally removed from the primary aircraft structure before depainting. [Last updated February 18, 2009]

28. Comment on an item originating in 40 CFR 63.745 regarding Aerospace NESHAP Coating
Applicability of Aerospace NESHAP Requirements in Title V: The requirements under the Aerospace NESHAP Coating (Condition II.B.26) emission unit do no apply to the following:

(1) Low-volume coatings for which the annual total of each separate formulation used at a facility does not exceed 189 l (50 gal), and the combined annual total of all such primers and topcoats used at a facility does not exceed 757 l (200 gal). Primers and topcoats exempted under paragraph 40 CFR 63.741(f) of this section and under 40 CFR 63.745(f)(3) and (g)(4) are not included in the 50 and 200 gal limits;

(2) Regulated activities associated with space vehicles designed to travel beyond the limit of the earth's atmosphere, including but not limited to satellites, space stations, and the Space Shuttle System (including orbiter, external tanks, and solid rocket boosters);

(3) Regulated activities associated with the rework of antique aerospace vehicles or components;

(4) Aerospace equipment that is no longer operational, intended for public display, and not easily capable of being moved; and

(5) Primers and topcoats containing HAP and VOC at concentrations less than 0.1 percent for carcinogens or 1.0 percent for noncarcinogens, as determined from manufacturer's representations.
vehicles or components. [Last updated February 18, 2009]

30. Comment on an item originating in 40 CFR 63.747 regarding Aerospace NESHAP General
For each operation that produces a waste which contains HAP and is not determined to be a hazardous waste under the RCRA, the permittee shall conduct the handling and transfer of the waste to or from containers in such a manner that minimizes spills: There are no monitoring, recordkeeping, or reporting requirements associated with this standard. This applicable requirement has been subsumed under the general housekeeping requirements of Condition II.B.26.c, therefore, it has not been incorporated into the operating permit. [Comment last updated on 10/01/2003] [Last updated February 18, 2009]

32. Comment on an item originating in 40 CFR 63 Subpart T regarding Baron Blakeslee Part Cleaner
National Emissions Standards for Halogenated Solvent Cleaning: The requirements found in 40 CFR 63.463 have not been included in this Title V permit because Hill Air Force Base has elected to determine compliance with the subpart using the alternative standard found in 40 CFR 63.464. [Comment last updated on 10/15/2002] [Last updated February 18, 2009]

34. Comment on an item originating in Approval Order dated July 12, 1979 regarding Basewide Gasoline Stations and Transfer Operations
Installation of the three 10,000 gallon underground storage tanks at the BX service station is approved if constructed and operated as proposed in the Notice of intent dated May 15, 1979: The requirements specified in the Notice of Intent are regulated by the Underground Storage Tank (UST) program and it is beyond the authority of the Title V program to include them in this permit. [Comment last updated on 7/08/2004] [Last updated February 18, 2009]

36. Comment on an item originating in Permit Application regarding Hydrazine Exhaust Incinerator
Incinerators at Hill Air Force Base (HAFB): In the past, HAFB has had other incinerators besides the Hydrazine Incinerator identified in this permit. They included the Medical Waste Incinerator and a Classified Waste Incinerator, both of which have been removed. There is currently only the one incinerator at the base. [Comment last updated on 5/07/1998] [Last updated February 18, 2009]

38. Comment on an item originating in AO Dated 2/20/1986 regarding IWTP- Air Stripper
Monitoring of VOC throughput: The approval order for the IWTP requires that VOC emissions be calculated annually. However, the Title V permit had imposed a more stringent quarterly calculation requirement in condition II.B.39.a of the Title V permit. Emissions from the IWTP are well below the emission limit and quarterly evaluation/calculation is not justified. The VOC Throughput calculation has been changed to an annual requirement and Hill AFB will continue to monitor stream flow rates daily and conduct stream sampling and analysis at least quarterly. [Comment last updated on 4/05/2005] [Last updated February 18, 2009]

40. Comment on an item originating in Approval Order dated February 20, 1986 regarding IWTP- Air Stripper
Total emissions of reactive and non-reactive volatile organic compound shall be reported to the Executive Secretary annually: This reporting requirement is subsumed under the general inventory requirements of R307-150, UAC. [Comment last updated on 7/08/2004] [Last updated February 18, 2009]

42. Comment on an item originating in 40 CFR 63 Subpart N regarding Metal Plating Subject to Hard Chrome NESHAP
3 Yr Testing of Chrome Plating Scrubbers: Condition II.B.12.a requires Hill AFB to test each Chrome Plating Scrubber every three years to demonstrate compliance with the Chrome NESHAP emission limit. However, the Chrome NESHAP does not require repeat testing. Repeat testing is not required in the NESHAP because pressure drop ranges are established based on a successful performance test. Pressure drop is monitored on a continuous basis to ensure that the range established in the performance test is not exceeded. UDAQ has removed the requirement to test every three years. Additional language from the NESHAP has been included in the Title V permit which allows repeat performance testing to revise the pressure drop range and require initial performance tests for new or reconstructed affected sources (i.e., each chrome plating tank) within 180 days of startup. [Comment last updated on 4/06/2005] [Last updated February 18, 2009]

44. Comment on an item originating in 40 CFR 63 Subpart N regarding Metal Plating Subject to Hard Chrome NESHAP

Reconstruction of Chrome Plating Lines: Hill AFB received an AO on March 15, 2005 to reconstruct the existing Chrome plating facilities to include composite mesh-pad scrubbers at each tank instead of at the emission point of each plating line and to revise the chrome plating operations. This is a significant change and is characterized as a reconstruction under 40 CFR 63 Subpart A of the CAAA. Several changes to the Title V permit have been made to allow operation of the reconstructed sources when construction is complete. Emission Unit 14 has be eliminated and the associated scrubber information included under Emission Unit 13. The number of scrubbers will not be included in Emission Unit 13; rather, it will be stated that each tank will be controlled by a composite mesh-pad scrubber. The revised provisions of the permit will require that each scrubber meet the requirements of the NESHAP. Provisions for new and reconstructed equipment and controls have been added to the permit. These provisions include preconstruction notifications, startup notifications, initial performance testing 180 days after startup, and submittal of a notice of compliance 90 days after the performance test. The revised language covers all requirements for the exiting facilities. [Comment last updated on 4/06/2005] [Last updated February 18, 2009]

46. Comment on an item originating in 40 CFR 63 Subpart N regarding Metal Plating Subject to Hard Chrome NESHAP

Rectifier Capacity Recordkeeping and **Reporting:** 40 CFR 63.346(b)(12) and 347(g)(3)(vii) require recordkeeping and reporting of rectifier capacity for facilities demonstrating that the less stringent emission limit 40 CFR 63.342(c)(1)(ii) applies. Hill AFB complies with the more stringent emission limit of 40 CFR 63.342(c)(1)(i) for larger operations and is not required to document and report rectifier capacity. UDAQ has removed the associated requirements from the Title V permit. [Comment last updated on 4/06/2005] [Last updated February 18, 2009]

48. Comment on an item originating in R307-165 Emission Testing regarding Metal Plating Subject to Hard Chrome NESHAP

Requirements for stack testing of Chrome Plating Operations are contained in Condition II.B.11.d.1 of the Hill AFB Title V permit.: This provision requires initial performance testing for new or reconstructed affected sources. The origin of this provision is 40 CFR 63.7(a)(2), 343(a)(2), 343(b)(1) and 343(c)(1)(iii). R307-165 requires emission testing at least once every five years for all sources with established emission limitations specified in approval orders issued under R307-401 or in section IX, Part H of the Utah state implementation plan. Approval Order DAQE-AN0121171-05 references 40 CFR 63 Subpart N but does not establish a separate emission limit under the new source review process, and hence testing every five years is not required. In addition Utah Air Conservation Act 19-2-106 specifies that no rule which the board makes for the purpose of administering a program under the federal Clean Air Act may be more stringent than the corresponding federal regulations which address the same circumstances. NESHAPs are presumed to meet the requirements of periodic monitoring under Title V of the CAA is stated in the EPA's periodic monitoring guidance - "For many emission points at most sources, monitoring already exists in current Federal or State regulations that satisfies the part 70 periodic monitoring requirement. First, all new standards proposed under the authority of section 111 NSPS and section 112 NESHAP after November 15, 1990 are presumed to have adequate monitoring to meet the periodic monitoring requirement for those standards." (EPA Periodic Monitoring Guidance, January 6, 2000). R307-165 does not apply to Metal Plating Subject to Hard Chrome NESHAP covered by 40 CFR 63 Subpart N. [Last updated February 18, 2009]

50. Comment on an item originating in 40 CFR 60 Subpart IIII regarding NSPS Compression Ignition

Internal Combustion Eng.

40 CFR 60 Subpart IIII definitions: 40 CFR 60 Subpart IIII defines emergency stationary internal combustion engine as any stationary internal combustion engine whose operation is limited to emergency situations and required testing and maintenance. Examples include stationary ICE used to produce power for critical networks or equipment (including power supplied to portions of a facility) when electric power from the local utility (or the normal power source, if the facility runs on its own power production) is interrupted, or stationary ICE used to pump water in the case of fire or flood, etc.

Useful life is defined as period during which the engine is designed to properly function in terms of reliability and fuel consumption, without being remanufactured, specified as a number of hours of operation or calendar years, whichever comes first. The values for useful life for stationary CI ICE with a displacement of less than 10 liters per cylinder are given in 40 CFR 1039.101(g). The values for useful life for stationary CI ICE with a displacement of greater than or equal to 10 liters per cylinder and less than 30 liters per cylinder are given in 40 CFR 94.9(a).

Model Year means either (1) The calendar year in which the engine was originally produced, or (2) The annual new model production period of the engine manufacturer if it is different than the calendar year. This must include January 1 of the calendar year for which the model year is named. It may not begin before January 2 of the previous calendar year and it must end by December 31 of the named calendar year. For an engine that is converted to a stationary engine after being placed into service as a nonroad or other nonstationary engine, model year means the calendar year or new model production period in which the engine was originally produced.

All CI ICE applicable engines at Hill Air Force Base are emergency only engines. None of the CI ICE engines have a displacement greater than 30 liters per cylinder. [Last updated February 18, 2009]

52. Comment on an item originating in 40 CFR 60 Subpart JJJJ regarding NSPS Spark Ignition Internal Combustion Engines

40 CFR 60 Subpart JJJJ definitions: 40 CFR 60 Subpart JJJJ defines emergency stationary internal combustion engine as any stationary internal combustion engine whose operation is limited to emergency situations and required testing and maintenance. Examples include stationary ICE used to produce power for critical networks or equipment (including power supplied to portions of a facility) when electric power from the local utility (or the normal power source, if the facility runs on its own power production) is interrupted, or stationary ICE used to pump water in the case of fire or flood, etc.

Certified emissions life is defined as the period during which the engine is designed to properly function in terms of reliability and fuel consumption, without being remanufactured, specified as a number of hours of operation or calendar years, whichever comes first. The values for certified emission life for stationary SI ICE with a maximum engine power less than or equal to 19 KW (25 HP) are given in 40 CFR 90.105. The values for certified emissions life for stationary SI ICE with a maximum engine power greater than 19 KW (25 HP) certified to 40 CFR part 1048 are given in 40 CFR 1048.101(g). The certified emission life for stationary SI ICE with a maximum engine power greater than or equal to 75 KW (100 HP) certified under the voluntary manufacturer certification program of this subpart is 5,000 hours or 7 years, whichever comes first.

Model Year means either (1) The calendar year in which the engine was originally produced, or (2) The annual new model production period of the engine manufacturer if it is different than the calendar year. This must include January 1 of the calendar year for

which the model year is named. It may not begin before January 2 of the previous calendar year and it must end by December 31 of the named calendar year. For an engine that is converted to a stationary engine after being placed into service as a nonroad or other nonstationary engine, model year means the calendar year or new model production period in which the engine was originally produced.

Stationary SI ICE using alcohol-based fuels are considered gasoline engines.

Internal combustion engines that are acting as temporary replacement units and that are located at a stationary source for less than 1 year and that have been properly certified as meeting the standards that would be applicable to such engine under the appropriate nonroad engine provisions, are not required to meet any other provisions under Subpart JJJJ.

All SI ICE applicable engines at Hill Air Force Base are emergency use only. [Last updated February 18, 2009]

54. Comment on an item originating in DAQE-669-88, Condition 3 regarding Solvent Distillation Units

Both distillation units shall be equipped with water-cooled shell and tube condensers. They shall operate whenever distillation is taking place: This is a design requirement that has been verified through site visit and specified in the emission unit description. Consequently, this specific condition was not incorporated into the operating permit. [Comment last updated on 7/08/2004] [Last updated February 18, 2009]

56. Comment on an item originating in R307-340-11 regarding Surface Coating of Miscellaneous Metal Parts

Use of purchase/issue records: Hill AFB currently uses purchase and/or issue records to ensure compliance with all materials limitations. All materials are checked for compliance with the applicable limits prior to being issued. The MMP conditions have been modified to reflect this practice. [Last updated February 18, 2009]